PRIVATE HIGHER EDUCATIONAL INSTITUTION
"INTERNATIONAL ACADEMY OF ECOLOGY AND MEDICINE"
Department of Surgery

WORKING PROGRAM OF EDUCATIONAL DISCIPLINE

"Pediatrics. Pediatrics infectious diseases"

LEVEL OF HIGHER EDUCATION Second (master's) level
DEGREE OF HIGHER EDUCATION Master's degree
BRANCH OF KNOWLEDGE 22 Healthcare
SPECIALTY 222 Medicine

Reviewed and approved
at the meeting of the department of surgery
Protocol No. 1, dated August 31, 2019

Kyiv 2019

Working program of education discipline Pediatrics. Pediatrics infectious diseases for the preparation of students of higher education of the second (master's) level of higher education in specialty 222 Medicine.

DESCRIPTION OF THE ACADEMIC DISCIPLINE

<table>
<tr><th>Name of indicators</th><th>Field of knowledge, direction of training, educational and qualification level</th><th colspan="2">Characteristics of the academic discipline</th></tr>
<tr><td rowspan="2">Credits – 19,5</td><td rowspan="2">Branch of knowledge:
22 "Health care"</td><td colspan="2">Full course</td></tr>
<tr><td rowspan="2">Modules - 6</td><td rowspan="2">Specialty
222 "Medicine"</td><td colspan="2">A year of training</td></tr>
<tr><td colspan="2">IV, V, VI</td></tr>
<tr><td rowspan="2">The total number of hours is
585 hours</td><td rowspan="2">Level of higher education: master's degree</td><td colspan="2">Semesters</td></tr>
<tr><td colspan="2">VII, VIII, IX, X, XI, XII</td></tr>
<tr><td rowspan="4"></td><td rowspan="3">Form of education : daytime</td><td>Lectures</td><td>70 hours</td></tr>
<tr><td>Practical</td><td>351 hours</td></tr>
<tr><td>S.S.</td><td>162 hours</td></tr>
<tr><td rowspan="2">Type of discipline: mandatory</td><td colspan="2">Type of control:</td></tr>
<tr><td colspan="2">Exam</td></tr>
</table>

INTRODUCTION

The study program of the educational discipline "Pediatrics. Pediatric infectious diseases" for the training of the second (master's) level of the field of knowledge 22 "Health care" specialty 222 "Medicine" Professional qualification "Doctor"

Pediatrics – Pediatric infectious diseases as an academic discipline:

a) is based on the study of students :

- medical and biological physics (the ability to explain the physical foundations of diagnostic and physiotherapeutic methods used in medical equipment; to interpret general physical and biophysical patterns underlying human life);
- human anatomy (knowledge of the topographic-anatomical relationships of human organs and systems; interpretation of age, sex, and individual features of the structure of the human body);
- microbiology, virology and immunology (the ability to interpret the biological properties of pathogenic and non-pathogenic microorganisms, viruses and the laws of their interaction with the macroorganism and the external environment; knowledge of the mechanisms of formation of the immune response of the human body);

- histology, cytology and embryology (the structure of various human organs under a microscope, at different age periods, as well as in conditions of physiological and reparative regeneration);
- physiology (knowledge of physiological foundations and methods of researching body function);
- internal diseases (the ability to determine patient management tactics, make a clinical diagnosis and provide emergency care for the most common emergency conditions in adults);
- surgery (the ability to provide emergency medical care for the most common surgical diseases; to plan a patient's examination, to interpret the results of laboratory and instrumental studies for the most common surgical diseases and their complications);
- pathomorphology (to know the pathogenesis and morphological changes at various stages of the development of the disease, the morphological basis of recovery, complications and consequences of diseases);
- pathophysiology (knowledge of causes, mechanisms of development and typical manifestations of various pathological processes);
- radiology (the ability to choose the optimal method of radiological research to establish a clinical diagnosis in the pathology of various organs and systems);

b) *lays the foundations for student learning*:

- infectious diseases, epidemiology, occupational diseases, oncology, which involves the integration of teaching with these disciplines and the formation of skills to apply knowledge from pediatrics in the process of further education and professional activity;

c) *lays the foundations of* a healthy lifestyle and prevention of the development of diseases of organs and systems of the child's body during life.

PURPOSE AND OBJECTIVES OF THE STUDY OF THE EDUCATIONAL DISCIPLINE

The purpose of studying pediatrics is to deepen theoretical knowledge, improve and master practical skills, and acquire a professional level of readiness of future doctors from the specialty "medicine" for independent work as a doctor.

The final goals of the educational discipline "pediatrics" are based on the educational goals defined in the educational and professional program (OPP). They are defined as follows:

1. To familiarize students with the basic information on developmental medicine.
2. To determine the etiological and pathogenetic factors of the most common somatic diseases of childhood.
3. Teaching basic practical skills, including collecting pediatric history and full physical examination of the child.
4. Classify and analyze the typical clinical picture of the most common somatic diseases of childhood.
5. Determine the features of diseases in different age periods.
6. Draw up an examination plan and analyze the data of laboratory and instrumental examinations in the typical course of the most common somatic diseases of childhood.
7. Demonstrate mastery of the principles of treatment, rehabilitation and prevention of the most common somatic diseases of childhood.
8. Diagnose and provide emergency care for the main emergency conditions in children with the most common somatic diseases of childhood.
9. Assess the prognosis for the most common somatic and non-infectious diseases of childhood.

10. Explaining major issues in the fields of infectious diseases, pulmonology, allergology and children's gastroenterology.
11. Explaining major issues in the fields of cardiovascular, urinary tract, neonatal, connective tissue and environmental diseases.
12. Explaining major issues in the fields of pediatric oncology and hematology, endocrinology and neurology.
13. Teaching practical skills in pediatrics.
14. Demonstrate mastery of the moral and deontological principles of a medical specialist and the principles of professional subordination in pediatrics.
15. Make a preliminary diagnosis of the most common somatic diseases of children.
16. Distinguish the features of the clinical course of the most common somatic diseases of children.
17. To determine the main directions of treatment of the most common somatic diseases of children.
18. Preparation for independent work in the field of pediatrics.
19. The discipline ensures that students acquire the following competencies:

General competences	
ZK-1	Ability to abstract thinking, analysis and synthesis.
ZK-2	Ability to learn and master modern knowledge.
ZK-3	Ability to apply knowledge in practical situations.
ZK-4	Knowledge and understanding of the subject area and understanding of professional activity.
ZK-5	Ability to adapt and act in a new situation.
ZK-6	Ability to make informed decisions.
ZK-7	Ability to work in a team.
ZK-8	Ability to interpersonal interaction.
ZK-10	Ability to use information and communication technologies.
ZK-11	Ability to search, process and analyze information from various sources.
ZK-12	Determination and persistence in relation to assigned tasks and assumed responsibilities.
Professional competences (FC)	
FC-1	Ability to collect medical information about the patient and analyze clinical data.
FC-2	Ability to determine the necessary list of laboratory and instrumental studies and evaluate their results.
FC-3	Ability to establish a preliminary and clinical diagnosis of the disease.
FC-4	The ability to determine the necessary regime of work and rest in the treatment and prevention of diseases.
FC-5	The ability to determine the nature of nutrition in the treatment and prevention of diseases.
FC-6	Ability to determine the principles and nature of treatment and prevention of diseases.
FC-7	Ability to diagnose emergency conditions.
FC-8	Ability to determine tactics and provide emergency medical care.
FC-10	Ability to perform medical manipulations.

FC-11	Ability to solve medical problems in new or unfamiliar environments in the presence of incomplete or limited information, taking into account aspects of social and ethical responsibility.
FC-13	Ability to carry out sanitary and hygienic and preventive measures.
FC-14	Ability to plan and carry out preventive and anti-epidemic measures for infectious diseases.
FC-16	Ability to maintain medical documentation, including electronic forms.
FC-17	The ability to assess the impact of the environment, socio-economic and biological determinants on the state of health of an individual, family, population.
FC-21	It is clear and unambiguous to convey one's own knowledge, conclusions and arguments on health care problems and related issues to specialists and non-specialists, in particular to people who are studying.
FC-23	The ability to develop and implement scientific and applied projects in the field of health care.
FC-24	Adherence to ethical principles when working with patients and laboratory animals.
FC-25	Adherence to professional and academic integrity, to be responsible for the reliability of the obtained scientific results.
Program Learning Outcomes (PLP)	
PRN-1	Have thorough knowledge of the structure of professional activity. To be able to carry out professional activities that require updating and integration of knowledge. To be responsible for professional development, the ability for further professional training with a high level of autonomy.
PRN-3	Specialized conceptual knowledge, which includes scientific achievements in the field of health care and is the basis for conducting research, critical understanding of problems in the field of medicine and related interdisciplinary problems.
PRN-4	Identify and identify leading clinical symptoms and syndromes (according to list 1); according to standard methods, using preliminary data of the patient's history, data of the patient's examination, knowledge about the person, his organs and systems, establish a preliminary clinical diagnosis of the disease (according to list 2).
PRN-5	Collect complaints, history of life and diseases, evaluate psychomotor and physical development of the patient, state of organs and systems of the body, based on the results of laboratory and instrumental studies, evaluate information regarding the diagnosis (according to list 4), taking into account the age of the patient.
PRN-6	Establish the final clinical diagnosis by making a reasoned decision and analyzing the received subjective and objective data of clinical, additional examination, differential diagnosis, observing the relevant ethical and legal norms, under the control of the head physician in the conditions of the health care institution (according to list 2).
PRN-7	Assign and analyze additional (mandatory and optional) examination methods (laboratory, functional and/or instrumental) (according to list 4) of patients with diseases of organs and body systems for differential diagnosis of diseases (according to list 2).
PRN-8	Determine the main clinical syndrome or what determines the severity of the condition of the victim/injured (according to list 3) by making a reasoned decision and assessing the person's condition under any circumstances (in the conditions of a health care institution, outside its borders), including in conditions of emergency

	and hostilities, in field conditions, in conditions of lack of information and limited time.
PRN-9	Determine the nature and principles of treatment (conservative, operative) of patients with diseases (according to list 2), taking into account the patient's age, in the conditions of a health care institution, outside its borders and at the stages of medical evacuation, including in field conditions, on the basis of a preliminary clinical diagnosis, observing the relevant ethical and legal norms, by making a reasoned decision according to existing algorithms and standard schemes, in case of the need to expand the standard scheme, be able to justify personalized recommendations under the control of the head physician in the conditions of a medical institution.
PRN-10	Determine the necessary mode of work, rest and nutrition on the basis of the final clinical diagnosis, observing the relevant ethical and legal norms, by making a reasoned decision according to existing algorithms and standard schemes.
PRN-12	To assess the general condition of a newborn child by making a reasoned decision according to existing algorithms and standard schemes, observing the relevant ethical and legal norms.
PRN-13	Assess and monitor the child's development, provide recommendations on feeding and specifics of nutrition depending on age, organize preventive vaccinations according to the calendar.
PRN-14	Determine tactics and provide emergency medical care in emergency situations (according to list 3) in limited time in accordance with existing clinical protocols and treatment standards.
PRN-17	Perform medical manipulations (according to list 5) in the conditions of a medical institution, at home or at work based on a previous clinical diagnosis and/or indicators of the patient's condition by making a reasoned decision, observing the relevant ethical and legal norms.
PRN-18	To determine the state of functioning and limitations of a person's vital activities and the duration of incapacity for work with the preparation of relevant documents, in the conditions of a health care institution, based on data about the disease and its course, peculiarities of the person's professional activity, etc. Maintain medical documentation regarding the patient and the contingent of the population on the basis of regulatory documents.
PRN-19	Plan and implement a system of anti-epidemic and preventive measures regarding the occurrence and spread of diseases among the population.
PRN-20	Analyze the epidemiological situation and carry out measures for mass and individual, general and local prevention of infectious diseases.
PRN-21	Search for the necessary information in the professional literature and databases of other sources, analyze, evaluate and apply this information.
PRN-22	Apply modern digital technologies, specialized software, and statistical methods of data analysis to solve complex healthcare problems.
PRN-23	Assess the impact of the environment on human health in order to assess the morbidity of the population.
PRN-24	To organize the necessary level of individual safety (own and the persons he cares for) in case of typical dangerous situations in the individual field of activity.

PRN-25	It is clear and unambiguous to convey one's own knowledge, conclusions and arguments on health care problems and related issues to specialists and non-specialists.
PRN-27	Communicate freely in the national and English languages, both orally and in writing to discuss professional activities, research and projects.
PRN-29	Plan, organize and carry out measures for the specific prevention of infectious diseases, including in accordance with the National calendar of preventive vaccinations, both mandatory and recommended. Manage vaccine residues, organize additional vaccination campaigns, including immunoprophylaxis measures.

According to with requirements educational and professional programs students should:
know:

- knows the environmental and epidemiological determinants of the most common neurological and neurodegenerative diseases;
- the most common life-threatening conditions in children and principles of management in these states
- basic mechanisms of cell damage and tissues
- ways of diagnostic and therapeutic management and therapeutic appropriate for specific conditions diseases
- environmental and epidemiological conditions of the most common diseases
- microorganisms, including pathogenic and those present in the physiological flora
- principles of management in these acute neurological conditions
- basic principles of pharmacotherapy in neurological disorders
- symptoms of iatrogenic infections, pathways of their spread and pathogens causing changes in individual organs
- principles of nutrition of healthy and sick children, including natural feeding, immunization and conducting a balance sheet of child health
- basics of microbiological diagnosis and parasitology
- genetic determinants of human blood groups and serological conflict in the Rh system
- issues of detailed pathology organ pathology, macroscopic and microscopic images and the clinical course of pathomorphological changes in individual organs
- basics of disinfection, sterilization and aseptic management aseptic
- issues of the abused child and sexual abuse, mental retardation mental retardation and behavioral disorders – psychoses, addictions, eating and excretion disorders in children
- clinical forms of the most common diseases of individual systems and organs, diseases of metabolic and disorders of water-electrolyte, endocrine and acid-base metabolism
- causes, symptoms, principles of diagnosis and therapeutic management of the most common diseases of children: 1) rickets, tetany, seizures, 2) heart defects, myocarditis, endocarditis and pericarditis, cardiomyopathy, arrhythmias Heart, heart failure, hypertension, syncope, 3) acute and chronic diseases of the upper and lower respiratory tracts, congenital defects of the respiratory system respiratory system, tuberculosis, cystic fibrosis, asthma, allergic rhinitis, urticaria, shock anaphylactic, angioedema, 4) anemia, hemorrhagic diathesis, conditions of bone marrow failure, malignant diseases of childhood of childhood, including solid tumors typical of childhood childhood, 5) acute and chronic abdominal pain, vomiting, diarrhea, constipation, gastrointestinal bleeding gastrointestinal tract, peptic ulcer disease, inflammatory intestinal diseases, pancreatic diseases, cholestasis and diseases of the liver and other acquired

diseases and congenital defects congenital defects of the gastrointestinal tract, 6) infections of the of the urinary system, congenital defects of the urinary system, nephrotic syndrome, kidney stones, acute and chronic renal failure, acute and chronic inflammation of the kidneys, systemic diseases of the of the kidneys, urinary disorders, disease of the vesicoureteral reflux disease, 7) disorders of growth, diseases of the thyroid and parathyroid glands, diseases of the adrenal glands, diabetes mellitus, obesity, disorders of puberty and function of the gonads, 8) cerebral palsy encephalitis and meningitis, epilepsy, 9) the most common infectious diseases of childhood of childhood,

be able:

- conduct a medical history on an pediatric patient;
- conduct routine health checks;
- maintain patient's medical records;
- based on patient condition and diagnostic results plan specialist consultations;
- carry out a physical examination of a child of all ages;
- carry out a medical interview with the child and his or her family;
- identify imminent life-threatening situations;
- perform basic procedures and medical procedures including: 1) body temperature measurement, heart rate measurement, non-invasive blood pressure measurement, 2) monitoring of vital signs by means of a patient monitor, pulse oximetry, 3) spirometric examination, oxygen therapy, assisted ventilation and replacement ventilation, 4) introduction of the oropharyngeal tube, 5) intravenous, intramuscular and subcutaneous injections, cannulation of peripheral veins, collection of peripheral venous blood, collection of blood for culture, collection of arterialized capillary blood, collection of arterialized capillary blood, 6) taking nasal, throat and skin swabs, puncturing of the pleural cavity, 7) bladder catheterization in women and men, gastric tube, gastric lavage, gastric lavage, enema, 8) standard resting electrocardiogram with interpretation, electrical cardioversion and cardiac defibrillation, 9) simple strip tests and blood glucose measurements, 10) airway management with endotracheal tube or supraglottic airway device; 11) POCUS;
- do a thorough and focused physical examination on an pediatric patient;
- interpret the results of laboratory tests and identify the causes of abnormalities;
- perform differential diagnosis of the most common diseases of adults and children;
- evaluate the patient's overall condition, level of consciousness, and awareness;
- interpret the results of laboratory tests and identify the causes of abnormalities;
- identify medical problems and prioritize medical management;
- select appropriate physical activity in the developmental period of children and adolescents and propose health training in adulthood, both in health and disease;
- assist in the performance of the following procedures and medical procedures: (i) bone marrow aspiration biopsy;
- assist in the performance of the following procedures and medical procedures: transfusion of blood and blood-derived products, drainage of the pleural cavity, puncture of the pericardial sac, puncture of the peritoneal cavity, lumbar puncture, fine-needle biopsy, epidermal tests, intradermal and scarification tests and interpret their results;
- assess the condition of the newborn on the Apgar scale and its maturity, and examine neonatal reflexes;
- develop diagnostic, therapeutic, and preventive treatments

- qualify the patient for vaccination;
- compile anthropometric and blood pressure measurements with data on centile grids;
- assess the degree of advancement of puberty;
- communicate and share knowledge with colleagues in a team;
- communicate with the patient and his family in an atmosphere of trust, taking into account the needs of the patient;
- implement appropriate and safe therapeutic treatment and predict its effects;
- plan the diagnostic procedure and interpret its results;
- identify life-threatening conditions that require immediate medical intervention;
- interpret the results of microbiological tests;
- critically evaluate the results of scientific research and adequately justify the position;
- apply nutritional treatment, including enteral and parenteral nutrition;

is ready to:

- perceive and recognize own limitations and self-assessing educational deficits and needs;
- to establish and maintain deep and respectful contact with patients and to show understanding for differences in world views and cultures;
- to be guided by the well-being of a patient;
- respect medical confidentiality and patients' rights;
- take actions towards the patient on the basis of ethical norms and principles, with an awareness of the social determinants and limitations of the disease;
- promote health-promoting behaviors;
- formulate conclusions from own measurements or observations;
- use objective sources of information.

PROGRAM OF EDUCATIONAL DISCIPLINE

Pediatrics. Diseases of young children and the most common somatic diseases in children

The discipline program is structured and presented by 6 modules and 1-6 content sections:

Topics of modules and content sections:

Module 1/course 4 Pediatrics:

1. Diseases of young children
2. Respiratory diseases in children
3. Allergic diseases in children
4. Cardiorheumatology of childhood
5. Pediatric gastroenterology
6. Diseases of the urinary system in children

Module 2/course 5 Pediatrics (including neonatology, edocrinology):

1. Neonatology
2. The most common non-infectious diseases of newborns
3. Perinatal infections
4. Diseases of blood systems in children
5. Diseases of the endocrine system in children

Module 3/course 6 Emergency Pediatrics:

1. Differential diagnosis of the most common respiratory diseases in children. Emergency care for the main emergency conditions in pulmonology practice.

2. Differential diagnosis of the most common diseases of the circulatory system in children. Emergency care for the main emergency conditions in cardiology practice.
3. Differential diagnosis of the most common diseases of the digestive organs in children. Emergency care for the main emergency conditions in gastroenterological practice.
4. Differential diagnosis of the most common diseases of the organs of the urinary system in children. Emergency care for major emergencies in nephrology practice.
5. Dispensary supervision of healthy and sick children in polyclinic conditions. Emergency care for major emergencies in outpatient clinic practice.

Module 4/course 6 Pediatric infectious diseases:

1. Differential diagnosis of the most common children's droplet infections
2. Differential diagnosis of the most common infectious diseases of the nervous system and SARS in children
3. Differential diagnosis of the most common acute intestinal infections and viral hepatitis.

Module 5/course 6 Practical clinical learning in Pediatrics
A practical course conducted in the form of clinical exercises at a pediatric ward

Module 6/course 6 Practical clinical learning at the student's choice
Possible to choose (Each student is limited to selecting only one practice to be included as part of the course):

1. Pediatric Pulmonology
2. Pediatric Cardiology
3. Pediatric Gastroenterology
4. Pediatric Endocrinology
5. Pediatric Nephrology
6. Neonatology

Types of educational activities of students according to the curriculum are:
a) lectures;
b) practical classes;
c) independent work of students.

Lectures are the main type of educational classes designed to teach theoretical material. As a rule, a separate lecture is an element of a course of lectures covering the main theoretical material of one or more topics of an academic discipline. The topics of the lectures are determined by the work program of the discipline. Lectures are conducted by scientific and pedagogical workers, as a rule, professors, associate professors and senior teachers. The lecturer is obliged to adhere to the working curriculum regarding the subject and content of the lectures, but is free in the interpretation of the educational material, forms and methods of its presentation.

Practical classes are a type of educational class in which students, under the guidance of a scientific and pedagogical worker, consolidate the theoretical provisions of the academic discipline and acquire the skills and abilities of their practical application through individual performance of appropriately formulated tasks. They provide for:

- collection of anamnesis;
- examination of a sick child;
- planning examination of a sick child;

- interpretation of laboratory and instrumental research data;
- differential diagnosis of the most common childhood diseases with their typical course;
- determination of the previous clinical diagnosis;
- determination of therapeutic tactics;
- prescription of medical nutrition;
- provision of emergency medical care;
- solving situational problems;
- practicing practical skills on dummies and at the bedside of a sick child;
- maintaining medical records.

The list of criteria for diagnosis and treatment of diseases is regulated by relevant protocols for the specialty "Pediatrics" and other Orders of the Ministry of Health of Ukraine.

The means of control are test tasks, clinical situational tasks; control of the implementation of practical skills. The grades received by the student for practical classes are taken into account when determining the final grade for this academic discipline.

The independent work of the student of education is a cognitive educational activity, during which the sequence of his mental and practical actions is determined by the student himself and depends entirely on him. Possible types of independent work of applicants: preparation for practical classes and study of topics considered only in the plan of independent work, search and study of additional literature, creation of algorithms, structural and logical schemes, writing abstracts, annotations, reports for speaking with messages at practical classes, writing histories of illnesses, being on duty at the clinic outside of school hours. The organization of independent work in the departments of the pediatric hospital should be provided by the teachers of the department.

5. CONTENTS OF THE PROGRAM

Module 1/course 4 "Pediatrics. Pediatric infectious diseases"

Chapter 1. Diseases of young children

Specific goals:

1. To determine the etiological and pathogenetic factors of rickets, hypervitaminosis D, protein-energy deficiency, functional gastrointestinal disorders of young children (cyclic vomiting syndrome, intestinal colic, functional diarrhea, functional constipation, etc.).
2. Classify and analyze the typical clinical picture of the most common functional gastrointestinal disorders in young children; rickets, spasmophilia and protein-energy deficiency.
3. Compile an examination plan and analyze the data of laboratory and instrumental examinations in the typical course of the most common functional gastrointestinal disorders, rickets and hypervitaminosis D in young children, protein-energy deficiency.
4. Demonstrate mastery of the principles of treatment, rehabilitation, and prevention of rickets, hypervitaminosis D, protein-energy deficiency, and functional gastrointestinal disorders in young children.
5. Make a preliminary diagnosis and carry out differential diagnosis in cyclic vomiting, functional diarrhea, colic and functional constipation; rickets and protein-energy deficiency in children.
6. Prognosis of life in rickets, hypervitaminosis D, protein-energy deficiency, functional gastrointestinal disorders in young children.

7. Demonstrate mastery of the moral and deontological principles of a medical specialist and the principles of professional subordination in pediatrics.

Topics of chapter 1. Diseases of young children.

Lesson 1. Rickets, hypervitaminosis "D", spasmophilia : etiology, pathogenesis, clinic, diagnosis, treatment, medical assistance in emergency situations, prevention of vitamin D deficiency.

Lesson 2. Protein-energy deficiency. Functional gastrointestinal disorders in young children (cyclic vomiting syndrome, functional constipation, functional diarrhea): etiology, pathogenesis, clinic, diagnosis, treatment, prevention, prognosis.

Chapter 2. Respiratory diseases in children.

Specific goals:

1. Determine the etiological and pathogenetic factors of acute respiratory diseases of the upper respiratory tract (acute nasopharyngitis, acute pharyngitis, acute obstructive laryngitis, acute laryngopharyngitis, acute tracheitis), acute bronchitis, acute obstructive bronchitis, acute bronchiolitis, recurrent bronchitis, pneumonia, congenital defects and chronic bronchopulmonary diseases systems in children.
2. Classify acute respiratory diseases of the upper respiratory tract, acute bronchitis and pneumonia, respiratory failure, fever, convulsions, birth defects and chronic diseases of the bronchopulmonary system; know the typical clinical picture of acute nasopharyngitis, acute pharyngitis, acute stenotic laryngeal tracheitis (croup), acute laryngopharyngitis, acute tracheitis, acute simple bronchitis, acute obstructive bronchitis, acute bronchiolitis, recurrent bronchitis, pneumonia, respiratory failure in children, hyperthermic syndrome and convulsions.
3. Compile an examination plan and analyze the data of laboratory and instrumental examinations in the typical course of acute respiratory diseases of the upper respiratory tract, pneumonia, congenital defects and chronic diseases of the bronchopulmonary system in children.
4. Demonstrate mastery of the principles of treatment, rehabilitation and prevention of acute nasopharyngitis, acute pharyngitis, acute laryngopharyngitis, acute tracheitis, acute bronchitis, acute obstructive bronchitis, acute bronchiolitis, recurrent bronchitis, pneumonia, congenital defects and chronic diseases of the bronchopulmonary system in children.
5. Make a preliminary diagnosis and make a prognosis for acute respiratory infections of the upper respiratory tract, acute bronchitis, pneumonia, congenital defects and chronic diseases of the bronchopulmonary system in children.
6. Demonstrate mastery of the moral and deontological principles of a medical specialist and the principles of professional subordination in pediatric pulmonology.

Topics of chapter 2. Diseases of respiratory organs in children.

Lesson 3. Acute respiratory infections of the upper respiratory tract: acute nasopharyngitis, acute pharyngitis, acute laryngopharyngitis, acute tracheitis in children. Respiratory failure: etiology, diagnosis, treatment, emergency care, prevention.

Lesson 4. Acute simple, obstructive, recurrent and chronic bronchitis and. Bronchiolitis. Chronic non-specific lung diseases. Cystic fibrosis and other congenital and hereditary diseases of the respiratory system in children.

Lesson 5. Pneumonia in children: etiology, pathogenesis, classification, clinical manifestations in children of different ages, principles of treatment, prevention.

Chapter 3. Allergic diseases in children
Specific goals:

1. To determine the etiological and pathogenetic factors of atopic dermatitis, allergic rhinitis, bronchial asthma in children, urticaria.
2. Classify and analyze the typical clinical picture of atopic dermatitis, allergic rhinitis, bronchial asthma in children, urticaria.
3. Compile an examination plan and analyze the data of laboratory and instrumental examinations in the typical course of atopic dermatitis, allergic rhinitis, urticaria, bronchial asthma in children.
4. Demonstrate mastery of the principles of treatment, rehabilitation, and prevention of atopic dermatitis, allergic rhinitis, urticaria, and bronchial asthma in children.
5. Make a preliminary diagnosis and make a life prognosis for urticaria, atopic dermatitis, allergic rhinitis, bronchial asthma in children.
6. Demonstrate mastery of the moral and deontological principles of a medical specialist and the principles of professional subordination in pediatric allergology.

Topics of chapter 3. Allergic diseases in children

Lesson 6. Atopic diseases in children: atopic dermatitis, allergic rhinitis, bronchial asthma. Etiology, pathogenesis, clinic, diagnosis, treatment, prevention. The concept of atopic march. Emergency care at various stages of asthma.

Chapter 4. Cardiorheumatology of childhood
Specific goals:

1. To determine the etiological factors and hemodynamics of the most common congenital heart defects (CHD) in children (ventricular septal defect, atrial septal defect, tetrad of Fallot, coarctation of the aorta, pulmonary artery stenosis, aortic stenosis, transposition of major vessels and patent ductus arteriosus); determine the etiology and pathogenesis of carditis, infectious endocarditis, cardiomyopathies, acute rheumatic fever, JRA, reactive arthropathies, heart rhythm and conduction disorders in children.
2. To classify and analyze the typical clinical picture of the most common VVS in children, carditis, infective endocarditis, cardiomyopathies, acute rheumatic fever, JRA, reactive arthropathies, heart rhythm and conduction disorders in children.
3. Draw up an examination plan and analyze the data of laboratory and instrumental examinations during the typical course of the most common congenital heart defects in children, carditis, infectious endocarditis, cardiomyopathies, acute rheumatic fever, JRA, reactive argropathies, heart rhythm and conduction disorders in children.
4. Demonstrate mastery of the principles of treatment, rehabilitation and prevention of the most common congenital heart defects in children, carditis, infectious endocarditis, cardiomyopathies, acute rheumatic fever, JURA, reactive arthropathies, heart rhythm and conduction disorders in children.
5. Make a preliminary diagnosis for the most common acute rheumatic fever, acute rheumatic fever, JRA, reactive arthropathies, carditis, cardiomyopathies, heart rhythm and conduction disorders in children.
6. Prognosis for the most common congenital heart defects in children, carditis, infective endocarditis, cardiomyopathies, acute rheumatic fever, JURA, reactive arthropathies, heart rhythm and conduction disorders in children.

7. Demonstrate mastery of the moral and deontological principles of a medical specialist and the principles of professional subordination in pediatric cardiorheumatology.

Topics of section 4. Cardiorheumatology of childhood

Lesson 7. The most common congenital heart defects in children. Etiology, hemodynamic classification, clinic, complications, indications for surgical treatment. Inflammatory and non-inflammatory heart diseases: rheumatic carditis, cardiomyopathy. Etiology, pathogenesis, clinic, treatment.

Lesson 8. Acute rheumatic fever in children. Juvenile idiopathic arthritis and reactive arthropathies. Etiology, pathogenesis, clinic, treatment, prevention.

Chapter 5. Diseases of digestive organs in children

Specific goals:

1. Determine etiological and pathogenetic factors of functional (functional dyspepsia, abdominal pain, irritable bowel syndrome, functional constipation) and organic diseases of the alimentary canal, biliary tract and pancreas in older children.
2. Classify and analyze a typical clinical picture of functional and organic diseases of the alimentary canal, biliary tract and pancreas in older children.
3. Draw up an examination plan and analyze the data of laboratory and instrumental examinations during the typical course of functional ones and organic diseases of the alimentary canal, biliary tract and pancreas in older children.
4. Demonstrate mastery of the principles of treatment, rehabilitation, and prevention of functional and organic diseases of the alimentary canal, biliary system, and pancreas in older children.
5. Make a preliminary diagnosis and make a prognosis of life in functional and organic diseases of the alimentary canal, biliary system and pancreas in older children.
6. Deontological principles of a medical specialist and the principles of professional subordination in pediatric gastroenterology.

Topics of chapter 5. Diseases of digestive organs in children

Lesson 9. Functional diseases of digestive organs in older children. Chronic gastritis, gastroduodenitis, peptic ulcer disease in children. Etiology, pathogenesis, clinic, diagnosis, treatment, prevention.

Lesson 10. Chronic diseases of the hepatobiliary system and pancreas. Pathogenesis, clinic, diagnosis, treatment and prevention.

Chapter 6. Diseases of the urinary system in children

Specific goals:

1. Determine the etiological and pathogenetic factors of infections of the urinary system (cystitis, pyelonephritis); acute and chronic glomerulonephritis in children, chronic kidney disease and dysmetabolic nephropathy in children.
2. Classify the diseases of urinary system infections, glomerulonephritis, chronic kidney disease and metabolic nephropathies in children.
3. Compile an examination plan and analyze laboratory and instrumental examination data for urinary system infection, glomerulonephritis, chronic kidney disease, and metabolic nephropathies in children.

4. Demonstrate mastery of the principles of treatment, rehabilitation, and prevention of urinary system infections, glomerulonephritis, chronic kidney disease, and metabolic nephropathies in children
5. Make a preliminary diagnosis and make a prognosis for infections of the urinary system, glomerulonephritis, chronic kidney disease and metabolic nephropathies in children.
6. Demonstrate mastery of the moral and deontological principles of a medical specialist and the principles of professional subordination in pediatric nephrology.

Themes of the division 6. Diseases of the urinary system in children

Lesson 11. Infections of the urinary system : acute and chronic pyelonephritis, cystitis. Etiology, pathogenesis, clinic, diagnosis, treatment, prevention.

Lesson 12. Acute and chronic glomerulonephritis. Chronic kidney disease. Etiology, pathogenesis, clinic, diagnosis, treatment, prevention and.

Lesson 13. Credit class, defense of medical history.

Module 2/course 5 "Pediatrics (including neonatology, endocrinology)"

Content section 1. Premature children.

Specific goals:

1. To determine the etiological factors of prematurity in newborns.
2. To classify and analyze the typical clinical picture of degrees of morphological and neurofunctional maturity of premature babies.
3. To determine the peculiarities of adaptation of premature newborns and diagnose maladaptation syndromes.
4. Draw up an examination plan and analyze laboratory and laboratory data instrumental examinations of premature newborns.
5. Demonstrate mastery of the principles of raising premature babies newborns, treatment and prevention of disadaptation syndromes, rehabilitation of premature newborns.
6. Diagnose and provide emergency care for the main emergency conditions in premature newborns: respiratory failure, intestinal paresis, hyperbilirubinemia, hypoglycemia.
7. Conduct differential diagnosis of hyperbilirubinemia in premature newborns and make a preliminary diagnosis.
8. To carry out a prognosis of the life of premature newborns.
9. Demonstrate mastery of moral and deontological principles of a medical specialist and the principles of professional subordination in of neonatology.

Lesson 1. Degrees of morphological and neuro-functional maturity of premature babies. Peculiarities of adaptation of premature newborns. Organization of care and feeding of premature babies.

Content section 2. The most common non-infectious diseases of newborns.

Specific goals:

1. To determine the etiological and pathogenetic factors of asphyxia and birth trauma of newborns, diseases of respiratory organs in newborns, hemolytic and hemorrhagic diseases of newborns.
2. Classify and analyze the typical clinical picture of asphyxia and birth trauma of newborns, diseases of respiratory organs in newborns, hemolytic and hemorrhagic diseases of newborns.

3. To determine the features of the course of asphyxia and birth trauma of newborns, diseases of respiratory organs in newborns, hemolytic and hemorrhagic diseases of newborns and make a preliminary clinical diagnosis.
4. Compile an examination plan and analyze the data of laboratory and instrumental examinations in the typical course of asphyxia and birth trauma of newborns, diseases of respiratory organs in newborns, hemolytic and hemorrhagic diseases of newborns.
5. Demonstrate mastery of the principles of treatment, rehabilitation and prevention of asphyxia and birth trauma of newborns, diseases of respiratory organs in newborns, hemolytic and hemorrhagic diseases of newborns.
6. Diagnose and provide emergency care for the main emergency conditions in newborns with manifestations of asphyxia and birth trauma, respiratory diseases in newborns, hemolytic and hemorrhagic diseases: cerebral hypertension syndrome, convulsive syndrome, apnea, bradycardia, intestinal paresis, respiratory failure, meconium syndrome aspiration and bleeding in newborns.
7. Carry out differential diagnosis of asphyxia and birth trauma, respiratory diseases, hemolytic and hemorrhagic diseases in newborns and make a preliminary diagnosis.
8. Prognosis of life in case of asphyxia and birth trauma, diseases of the respiratory organs, hemolytic and hemorrhagic diseases of newborns.
9. Demonstrate mastery of moral and deontological principles medical specialist and the principles of professional subordination in neonatology.

Lesson 2. Syndrome of respiratory disorders of newborns. Asphyxia of newborns.

Lesson 3. Birth trauma of newborns. Etiology, pathogenesis, classification, clinic, diagnosis, primary resuscitation of newborns, treatment, prevention, prognosis.

Lesson 4. Hemolytic and hemorrhagic diseases of newborns. Etiology, pathogenesis, classification, clinic, diagnosis, primary resuscitation of newborns, treatment, prevention, prognosis.

Content section 3. Perinatal infections.

Specific goals:

1. Determine etiological, pathogenetic factors and risk factors in perinatal infectious diseases in newborns.
2. Classify and analyze the typical clinical picture of perinatal infectious diseases in newborns: intrauterine infection, local and generalized infection
3. Determine the features of perinatal infectious diseases of newborns (intrauterine infection, local and generalized infection) and make a preliminary clinical diagnosis.
4. Compile an examination plan for perinatal infectious diseases of newborns (intrauterine infection, local and generalized infection) and analyze the data of laboratory and instrumental examinations during their typical course.
5. Demonstrate mastery of the principles of treatment, rehabilitation and prevention of perinatal infectious diseases of newborns (intrauterine infection, local and generalized infection).
6. Diagnose and provide emergency care in acute respiratory failure, acute renal failure, convulsive syndrome, necrotizing enterocolitis, disseminated intravascular coagulation syndrome in perinatal infectious diseases in newborns.
7. Carry out differential diagnosis of perinatal infections and put previous diagnosis.
8. Prognosis of life in case of perinatal infectious diseases of newborns (intrauterine infection, local and generalized infection).

9. Demonstrate mastery of moral and deontological principles medical specialist and the principles of professional subordination in neonatology.

Lesson 5. Etiology, pathogenetic factors and risk factors in perinatal infectious diseases in newborns. Bacterial infections in newborns. Pneumonia of newborns.

Lesson 6. Intrauterine infections of the newborn (TORCH - infections). Protection of medical history.

CHAPTER 2. DISEASES OF THE BLOOD AND ENDOCRINE SYSTEM IN CHILDREN.

Content section 4. Diseases of the blood system in children.

Specific goals:

1. To determine the etiological and pathogenetic factors of deficiency anemias, leukemias and lymphomas, hemophilia, thrombocytopenia and thrombocytopenia in children.
2. Classify and analyze the typical clinical picture of deficiency anemias, leukemias and lymphomas, hemophilia, thrombocytopenia and thrombocytopenia in children.
3. Determine the features of deficiency anemias, leukemias and lymphomas, hemophilia, thrombocytopenia and thrombocytopenia in children and make a preliminary clinical diagnosis.
4. Compile an examination plan and analyze the data of laboratory and instrumental examinations in the typical course of deficiency anemia in children, in the typical course of leukemia and lymphoma in children, in the typical course of hemophilia, thrombocytopenia, and thrombocytopenia in children.
5. Demonstrate mastery of the principles of treatment and prevention of deficiency anemia, treatment, prevention and rehabilitation of leukemia and lymphoma, hemophilia, thrombocytopenia and thrombocytopenia in children.
6. Diagnose and provide emergency care for acute bleeding, hemorrhagic shock and compression syndromes in children.
7. Carry out differential diagnosis of deficiency anemias, leukemias and lymphomas, hemophilia, thrombocytopenia and thrombocytopenia with other diseases of the blood system in children.
8. Prognosis of life in deficiency anemias, leukemias and lymphomas, hemophilia, thrombocytopenias and thrombocytopathies in children.
9. Demonstrate mastery of moral and deontological principles medical specialist and the principles of professional subordination in pediatrics.

Lesson 7. Iron-, protein- and vitamin deficiency anemia in children: etiology, pathogenesis, classification, clinic, diagnosis, differential diagnosis, treatment, prevention, prognosis.

Lesson 8. Hemorrhagic diseases in children. Hemoblastosis in children. Etiology, pathogenesis, classification, diagnosis, treatment, prognosis.

Content section 5. Diseases of the endocrine system in children.

Specific goals:

1. Determine the etiological and pathogenetic factors of diabetes in children, diffuse toxic goiter, hypothyroidism, autoimmune thyroiditis, endemic goiter in children; various clinical forms of growth pathology, obesity, pubertal dyspituitarism, various forms of gonadal pathology, congenital and acquired hypopituitarism, hyperpituitarism, prolactinoma, physiological

gynecomastia; precocious puberty, incomplete precocious puberty, hypoparathyroidism, Cushing's syndrome.

2. Classify and analyze the typical clinical picture of diabetes in children, diffuse toxic goiter, hypothyroidism, autoimmune thyroiditis, endemic goiter in children; various clinical forms of growth pathology, obesity, pubertal dyspituitarism, various forms of gonadal pathology, congenital and acquired hypopituitarism, hyperpituitarism, prolactinoma, physiological gynecomastia; precocious puberty, incomplete precocious puberty, hypoparathyroidism, Cushing's syndrome.
3. Determine the features of congenital hypothyroidism and adreno-genital hypothyroidism syndrome in newborn children and put the previous clinical diagnosis.
4. Compile an examination plan and analyze the data of laboratory and instrumental examinations in the typical course of diabetes mellitus in children, in the typical course of diffuse toxic goiter, hypothyroidism, autoimmune thyroiditis, endemic goiter in children; with various clinical forms of growth pathology, obesity, pubertal dyspituitarism, various forms of gonadal pathology, congenital and acquired hypopituitarism, hyperpituitarism, prolactinoma, physiological gynecomastia; precocious puberty, incomplete precocious puberty, hypoparathyroidism, Cushing's syndrome.
5. Diagnose and provide emergency care for ketoacidosis and hypoglycemic insects and thyrotoxic crisis in children.
6. Carry out differential diagnosis of diabetes in children, various types of tumors; diffuse toxic goiter, hypothyroidism, autoimmune thyroiditis, endemic goiter in children; various clinical forms of growth pathology, obesity, pubertal dyspituitarism, various forms of gonadal pathology and make a preliminary diagnosis.
7. To carry out a prognosis of life in diabetes, diffuse toxic goiter, hypothyroidism, autoimmune thyroiditis, endemic goiter in children, various clinical forms of growth pathology; obesity, pubertal dyspituitarism, various forms of pathology of the gonads.
8. Demonstrate mastery of moral and deontological principles medical specialist and the principles of professional subordination in pediatrics.

Lesson 9. Different types of diabetes in children. Etiology, pathogenesis, classification, clinic, diagnosis, differential diagnosis

Lesson 10. Diabetes: treatment, prevention, prognosis of diabetes in children. Insulin therapy.

Lesson 11. Diseases of the thyroid and parathyroid glands in children. Etiology, pathogenesis, clinic, diagnosis, differential diagnosis,

Lesson 12. Treatment, prevention of diffuse toxic goiter, hypothyroidism, autoimmune thyroiditis, endemic goiter in children. Goiter degrees.

Lesson 13. Diseases of the hypothalamic-pituitary system and gonads in children. Etiology, pathogenesis, classification, clinic, diagnosis, differential diagnosis, treatment, prevention of various clinical forms of growth pathology

Lesson 14. Protection of medical history.

Module 3/ course 6 "Pediatrics of emergency conditions"

Content section 1. Differential diagnosis of the most common respiratory diseases in children. Emergency care for the main emergency conditions in pulmonology practice.

Specific goals :

1. determine various clinical variants and complications of the most common respiratory diseases in children;

2. to determine the patient management tactics for the most common diseases of the respiratory organs in children;
3. demonstrate the ability to maintain medical records of sick children with respiratory pathology;
4. plan the examination of a sick child and interpret the obtained results in the most common diseases of the respiratory organs;
5. carry out differential diagnosis and make a preliminary clinical diagnosis for the most common diseases of the respiratory organs, make a diagnosis and provide emergency care for emergency conditions caused by diseases of the respiratory organs in children.

Lesson 1. Differential diagnosis of pneumonia in children. Complications of pneumonia. Leading clinical symptoms and syndromes in various clinical variants and complications of pneumonia in children. Data of laboratory and instrumental studies in various clinical variants of pneumonia and its complications (pleurisy, abscess, pyothorax, pneumothorax). Emergency care for acute respiratory failure in children.

Lesson 2. Differential diagnosis of bronchial obstruction syndrome in children. Leading clinical symptoms and syndromes in bronchial asthma, bronchiolitis and acute obstructive bronchitis in children. Emergency care for status asthmaticus.

Content section 2. Differential diagnosis of the most common diseases of the circulatory system in children. Emergency care for the main emergency conditions in cardiology practice.
Specific goals :

1. identify different clinical variants and complications of the most common diseases circulatory systems in children;
2. determine the tactics of patient management in the most common diseases of the circulatory system in children;
3. demonstrate the ability to maintain medical records of sick children with pathologies of the circulatory system ;
4. plan the examination of a sick child and interpret the obtained results in the most common diseases of the circulatory system;
5. carry out differential diagnosis and make a preliminary clinical diagnosis for the most common diseases of the circulatory system;
6. diagnose and provide emergency care in emergency situations caused by diseases of the circulatory system in children;

Lesson 3. Differential diagnosis of cardiomegaly in children. Leading clinical symptoms and syndromes of diseases of the circulatory system in children accompanied by cardiomegaly. Clinical variants of the course and complications of myocarditis, endocarditis, pericarditis, cardiomyopathies, congenital and acquired heart defects in children. Providing emergency care for acute heart failure. Treatment and prevention of chronic heart failure.

Lesson 4. Differential diagnosis of carditis and heart rhythm in children. Leading clinical symptoms and syndromes in extrasystole, paroxysmal tachycardia, atrial fibrillation, complete atrioventricular block. Clinical variants of the course of paroxysmal tachycardia and atrial fibrillation in children. Data of instrumental studies in extrasystole, paroxysmal tachycardia, atrial fibrillation, complete atrioventricular blockade. Emergency care for paroxysmal rhythm disturbances and Morgana-Adams- Stokes syndrome.

Lesson 5. Differential diagnosis of systemic connective tissue diseases and systemic vasculitis in children. Leading clinical symptoms and syndromes in juvenile rheumatoid arthritis, systemic lupus erythematosus, acute rheumatic fever, dermatomyositis, scleroderma, Kawasaki disease, polyarteritis nodosa and other systemic vasculitis in children. Clinical variants of the course and complications of systemic connective tissue diseases and systemic vasculitis in children.

Content section 3. Differential diagnosis of the most common diseases of the digestive organs in children. Emergency care for the main emergency conditions in gastroenterological practice.
Specific goals :

1. identify different clinical variants and complications of the most common diseases digestive systems in children;
2. determine the tactics of patient management in the most common diseases of the digestive system in children;
3. demonstrate the ability to maintain medical records of sick children with digestive system pathology;
4. plan the examination of a sick child and interpret the results obtained in the most common diseases of the digestive system;
5. carry out differential diagnosis and make a preliminary clinical diagnosis for the most common diseases of the digestive system;
6. diagnose and provide emergency care in emergency situations caused by diseases of the digestive system in children.

Lesson 6. Differential diagnosis of functional and organic diseases of the stomach in children. Leading clinical symptoms and syndromes in functional and organic diseases of the stomach in children (reflux disease, gastritis, peptic ulcer disease of the stomach and duodenum). Clinical - instrumental research and differential diagnosis of dyspeptic, abdominal pain syndrome. Emergency care for the complicated course of peptic ulcer disease in children.

Lesson 7. Differential diagnosis of functional and organic intestinal diseases in children. Leading clinical symptoms and syndromes in functional and organic intestinal diseases in children (functional dyspepsia, irritable bowel syndrome, functional constipation, disaccharidase deficiency, exudative enteropathy, celiac disease, cystic fibrosis, Crohn's disease, nonspecific ulcerative colitis). Clinico- instrumental studies and differential diagnosis of abdominal pain syndrome and intestinal malabsorption syndrome in children.

Lesson 8. Differential diagnosis of diseases of the hepatobiliary system and pancreas in children. Leading clinical symptoms and syndromes in biliary dyskinesia, acute and chronic cholecystitis and chronic hepatitis in children. Clinical variants of the course of biliary dyskinesia, acute and chronic cholecystitis and chronic hepatitis in children. Portal hypertension syndrome. Emergency care for acute liver failure.

Content section 4. Differential diagnosis of the most common diseases of the urinary system in children. Emergency care for major emergencies in nephrology practice.
Specific goals:

1. identify different clinical variants and complications of the most common diseases urinary system in children
2. determine the tactics of patient management in the most common diseases of the urinary system in children

3. demonstrate the ability to maintain medical records of sick children with urinary system pathology
4. plan the examination of a sick child and interpret the obtained results in the most common diseases of the urinary system
5. carry out differential diagnosis and make a preliminary clinical diagnosis for the most common diseases of the urinary system in children
6. diagnose and provide emergency care in emergency situations caused by diseases of the urinary system in children

Lesson 9. Differential diagnosis of infectious and inflammatory diseases of the urinary system in children. Leading clinical symptoms and syndromes in infectious-inflammatory diseases of the urinary system (infections of the urinary system, urethritis, cystitis, pyelonephritis), dysmetabolic nephropathies, hereditary tubulopathies (phosphate-diabetes, Debré-de-Tony-Fanconi syndrome, renal diabetes insipidus, renal tubular acidosis) and interstitial nephritis in children. Clinical variants of the course and complications of infectious and inflammatory diseases of the urinary system, interstitial nephritis, dysmetabolic nephropathies and hereditary tubulopathies in children.

Lesson 10. Differential diagnosis of acute poststreptococcal glomerulonephritis with Alport's hereditary nephritis, rapidly progressive glomerulonephritis, Berger's disease, etc. Nephrotic syndrome in children: differential diagnosis, complications. Clinical variants of the course of chronic glomerulonephritis in children. Acute and chronic kidney failure in children - emergency care.

Content section 5. Dispensary supervision of healthy and sick children in polyclinic conditions. Emergency care for major emergencies in outpatient clinic practice.
Specific goals:

1. Identify various clinical options and complications during dispensary supervision of healthy and sick children in the polyclinic;
2. Determine the tactics of managing children during dispensary supervision of healthy and sick children in the polyclinic;
3. Demonstrate the ability to maintain pediatric medical documentation in a polyclinic;
4. Plan examination of children and interpret the obtained results during dispensary supervision of healthy and sick children in the polyclinic;
5. Carry out differential diagnosis and make a preliminary clinical diagnosis for children who are under dispensary supervision in the polyclinic;
6. Diagnose and provide emergency care to children under dispensary supervision at the polyclinic.

Lesson 11. Dispensary supervision of healthy and sick children in polyclinic conditions. Emergency care for major critical conditions.

Lesson 12. Comprehensive medical examination of children of different ages.

Module 4/course 6 "Pediatric infectious diseases"

Content section 1. Children's droplet infections.
Specific goals:

1. Cyrus. Rubella. Etiology, epidemiology, pathogenesis, clinic of typical forms, complications. Congenital rubella. Principles of treatment. Specific prevention. Anti-epidemic measures in the focus of infection.

2. Chickenpox. Scarlet fever. Etiology, epidemiology, pathogenesis, clinic of typical forms, complications. Principles of treatment. Anti-epidemic measures in the focus of infection.
3. Mumps infection. Whooping cough. Etiology, epidemiology, pathogenesis, clinic of typical forms, complications. Principles of treatment. Anti-epidemic measures in the focus of infection.
4. Diphtheria. Infectious mononucleosis. Etiology, epidemiology, pathomorphological features of various forms. Classification, clinic of typical forms, complications. Diagnostics. Principles of treatment. Specific prevention. Anti-epidemic measures in the focus of infection.

Lesson 1. Cyrus. Rubella, Chickenpox. Scarlet fever.

Content section 2. Infectious diseases of the nervous system and SARS in children.
Specific goals:

1. Meningococcal infection. Enterovirus infection. Etiology, epidemiology, pathogenesis. Classification. Clinic of various forms. Complication. Diagnostics. Consequences. Principles of treatment. Specific prevention and anti-epidemic measures in the focus of infection.
2. Acute respiratory viral infections (influenza, parainfluenza, adenovirus, respiratory syncytial, rhinovirus infection) Etiology, epidemiological features, pathogenesis. Clinical forms. Complication. Diagnostics. Principles of treatment and prevention. Features of the clinical course, diagnosis, treatment and prevention of influenza A/ H1N1.

Lesson 2. Meningococcal infection

Content section 3. Acute intestinal infections and viral hepatitis.
Specific goals:

1. Shigellosis. Salmonellosis. Escherichia. Staphylococcal enterocolitis. Viral diarrhea. Etiology, epidemiology, pathogenesis. Classification. Clinic of typical forms in children of different ages. Complication. Laboratory diagnostics. Principles of treatment and prevention.
2. Viral hepatitis A, B, C, D and others Etiology, epidemiological features, pathogenesis. Classification. Clinic of various forms. Laboratory diagnostics. Principles of treatment and prevention.

Lesson 3. Acute respiratory viral infections (influenza, parainfluenza, adenovirus, respiratory syncytial, rhinovirus infection.

Lesson 4. Viral hepatitis A, B, C, D and others.

Content section 1. Children's droplet infections.
Specific goals:

1. HIV/AIDS in children. AIDS-opportunistic infections (pneumocystis, candidiasis, cryptococcal infection and others) Epidemiological features in children. Clinical and laboratory diagnosis of AIDS-opportunistic infections. Principles of treatment. Prevention of congenital HIV infection. Peculiarities of managing pediatric patients in the terminal stage of the disease, counseling, care, psychological, spiritual and social support of the patient and his relatives.
2. TORCH infections (toxoplasmosis, cytomegalovirus infection, herpes infection) Etiology, epidemiology, pathogenesis. Clinic of acquired and congenital forms. Laboratory diagnostics. Principles of treatment and prevention.

Lesson 5. HIV/AIDS in children.

Module 5/course 6 Practical clinical learning in Pediatrics

Specific goals:

1. Understand the etiology and epidemiology of common pediatric respiratory infections.
2. Recognize the clinical features of respiratory infections in children of different ages.
3. Diagnose respiratory infections using appropriate laboratory tests.
4. Implement effective treatment plans and preventive measures.
5. Identify the causes of gastroenteritis in children, including viral and bacterial etiologies.
6. Assess dehydration status and plan rehydration strategies.
7. Understand the pathophysiology of gastroenteritis and its potential complications.
8. Develop treatment protocols considering the age and severity of the disease.
9. Differentiate between various causes of fever in children.
10. Perform a thorough clinical evaluation of the febrile child.
11. Utilize laboratory and imaging studies effectively in the evaluation of febrile illnesses.
12. Establish treatment plans based on current guidelines and evidence-based practice.
13. Review the pediatric immunization schedule and the rationale behind it.
14. Address common parental concerns and misconceptions about vaccines.
15. Manage vaccine-preventable diseases in clinical practice.
16. Discuss the management of adverse reactions to vaccinations.
17. Identify triggers and clinical patterns of asthma in children.
18. Utilize spirometry and other diagnostic tests in the assessment of pediatric asthma.
19. Develop acute and long-term management plans for pediatric asthma.
20. Educate patients and families about asthma control and prevention strategies.
21. Differentiate between seizure types and their implications in pediatric patients.
22. Apply protocols for the acute management of seizures.
23. Use long-term pharmacological and non-pharmacological treatments for epilepsy.
24. Provide family education and support for children with chronic neurological conditions.
25. Evaluate nutritional status and recognize signs of malnutrition in children.
26. Understand the dietary needs of children at different developmental stages.
27. Manage common nutritional deficiencies with appropriate interventions.
28. Counsel families on healthy eating habits and preventive nutrition.
29. Identify common congenital heart defects in children.
30. Interpret basic diagnostic tests such as echocardiograms.
31. Collaborate with pediatric cardiologists in the management of congenital heart diseases.
32. Discuss surgical and non-surgical treatment options with families.

Module 6/course 6 Practical clinical learning <u>at the student's choice</u>

Students can choose classes from the following options:

Neonatology
Pediatrics endocrinology

Neonatology
Specific goals:

1. Neonatal Respiratory Distress Syndrome (NRDS): Etiology, epidemiology, pathogenesis. Detailed classification of severity levels. Clinical features in premature and term neonates. Potential complications and their management. Laboratory and radiological diagnostics. Principles of treatment, including surfactant therapy and ventilatory support. Preventive strategies.
2. Neonatal Sepsis: Identification of bacterial, viral, and fungal etiologies. Epidemiological trends and risk factors. Pathogenesis with a focus on immune system immaturity in neonates. Clinical manifestations in early and late-onset sepsis. Laboratory markers for diagnosis. Treatment protocols including antibiotic therapy. Prevention measures, including maternal screening and hygiene practices.
3. Jaundice in Newborns: Understanding physiological vs. pathological jaundice. Etiologies including blood group incompatibilities and metabolic disorders. Clinical assessment and the importance of timing in jaundice appearance. Laboratory evaluations including bilirubin levels. Treatment options such as phototherapy and exchange transfusion. Preventive strategies focusing on risk identification.
4. Preterm Birth Complications: Identifying risk factors and etiologies. Management of common complications like intraventricular hemorrhage, necrotizing enterocolitis, and retinopathy of prematurity. Approaches to nutritional support for preterm infants. Guidelines for the use of growth factors and other medications. Long-term follow-up and developmental surveillance.
5. Congenital Infections (TORCH Complex): Understanding the etiology and transmission of Toxoplasmosis, Other agents (like syphilis), Rubella, Cytomegalovirus, and Herpes simplex. Clinical features and diagnostic approach. Management strategies and treatment options. Preventive measures including maternal screening and vaccination.
6. Neonatal Cardiology: Identifying common congenital heart defects. Pathophysiology and clinical manifestations. Diagnostic techniques including echocardiography. Management of critical congenital heart diseases in the neonatal period. Surgical and non-surgical treatment options. Long-term care and follow-up strategies.
7. Nutritional Needs of Neonates: Understanding the unique nutritional requirements. Management of feeding problems in preterm and sick neonates. Use of breast milk, formula, and fortifiers. Monitoring growth and development. Prevention and management of complications related to nutrition like necrotizing enterocolitis.
8. Developmental Care in Neonatology: Principles of developmental care. Strategies to minimize stress and pain in neonates. Role of family-centered care. Environmental modifications to support neurodevelopmental outcomes. Importance of early intervention services.
9. Neonatal Neurology: Recognizing and managing common neurological conditions like seizures, hypoxic-ischemic encephalopathy, and periventricular leukomalacia. Use of neuroimaging and other diagnostic tools. Neuroprotective strategies. Long-term neurodevelopmental follow-up.
10. Ethical Issues and Decision-Making in Neonatology: Discussing ethical dilemmas in neonatal care, including end-of-life decisions. Principles of family-centered care and shared decision-making. Legal aspects related to neonatal care. Strategies for effective communication with families during critical situations.

Pediatrics endocrinology
Specific goals:

1. Growth Disorders: Understanding the normal growth patterns in children. Identifying and diagnosing causes of growth failure including growth hormone deficiency and systemic illnesses. Approaches to treatment including growth hormone therapy. Monitoring and managing potential side effects of treatment. Long-term follow-up and assessment of growth outcomes.
2. Thyroid Disorders in Children: Comprehensive understanding of hypothyroidism and hyperthyroidism etiologies, including congenital and acquired causes. Diagnostic approach including interpretation of thyroid function tests. Management of conditions like congenital hypothyroidism, Graves' disease, and Hashimoto's thyroiditis. Monitoring for complications and long-term outcomes.
3. Disorders of Puberty: Differentiating between normal and abnormal pubertal development. Diagnosis and management of precocious and delayed puberty, including underlying etiologies such as central nervous system abnormalities and genetic conditions. Treatment strategies including hormone therapy. Psychosocial aspects and counseling for affected children and their families.
4. Diabetes Mellitus in Children: Epidemiology and pathophysiology of Type 1 and Type 2 diabetes in children. Diagnosis, including interpretation of blood glucose and HbA1c levels. Management strategies including insulin therapy and lifestyle modifications. Education on diabetes self-management. Prevention and management of acute and long-term complications.
5. Adrenal Disorders: Understanding conditions like congenital adrenal hyperplasia, Addison's disease, and Cushing's syndrome. Diagnostic approach including hormonal assays. Treatment options and management of acute adrenal crises. Long-term monitoring and management of hormonal replacement therapy.
6. Bone and Calcium Disorders: Disorders affecting bone metabolism, including rickets, osteoporosis, and hyperparathyroidism. Etiologies, clinical manifestations, and diagnostic approach. Treatment strategies including vitamin D and calcium supplementation. Monitoring for complications and ensuring optimal bone health.
7. Pediatric Obesity: Understanding the etiology and pathophysiology of obesity in children. Assessment of obesity-related complications like insulin resistance and dyslipidemia. Management strategies including lifestyle modifications, nutritional counseling, and pharmacotherapy. Prevention strategies and community health approaches.
8. Disorders of Sex Development: Understanding the genetic, hormonal, and anatomical aspects. Diagnostic approach including genetic testing and hormonal assays. Management strategies focusing on gender assignment, hormonal therapy, and surgical options. Counseling and psychological support for patients and families.
9. Endocrine Tumors in Children: Identifying and managing endocrine neoplasms such as thyroid nodules, adrenal tumors, and pituitary adenomas. Diagnostic approach including imaging and biopsy. Treatment options including surgery, radiation, and medical therapy. Surveillance and long-term follow-up.

INDICATIVE STRUCTURE OF THE EDUCATIONAL DISCIPLINE:

Topic	Lectures	Practical trainings	SRS
MODULE 1			
Diseases of young children			
Rickets, hypervitaminosis "D", spasmophilia: etiology, pathogenesis, clinic, diagnosis, treatment, emergency medical care, prevention of vitamin D deficiency.	1	2	1
Protein-energy deficiency. Functional gastrointestinal disorders in young children (cyclic vomiting syndrome, functional constipation, functional diarrhea): etiology, pathogenesis, clinic, diagnosis, treatment, prevention.	2	4	2
Respiratory diseases in children			
Acute respiratory infections of the upper respiratory tract: acute nasopharyngitis, acute pharyngitis, acute laryngopharyngitis, acute tracheitis in children. Respiratory failure: etiology, diagnosis, treatment, emergency care, prevention.	2	5	2
Acute simple, obstructive, recurrent and chronic bronchitis and. Bronchiolitis. Chronic non-specific lung diseases. Cystic fibrosis and other congenital and hereditary diseases of the respiratory system in children.	2	5	2
Pneumonia in children: etiology, pathogenesis, classification, clinical manifestations in children of different ages, principles of treatment, prevention.	2	3	1
Allergic diseases in children			
Atopic diseases in children: atopic dermatitis, allergic rhinitis, bronchial asthma. Etiology, pathogenesis, clinic, diagnosis, treatment, prevention. The concept of atopic march. Emergency care at various stages of asthma.	3	4	2
Cardiorheumatology of childhood			
The most common congenital heart defects in children. Etiology, hemodynamic classification, clinic, complications, indications for surgical treatment. Inflammatory and non-inflammatory heart diseases: non-rheumatic carditis, cardiomyopathy. Etiology, pathogenesis, clinic, treatment. Acute rheumatic fever in children. Juvenile idiopathic arthritis and reactive arthropathies. Etiology, pathogenesis, clinic, treatment, prevention.	3	5	3
Diseases of the digestive system in children			
Functional diseases of digestive organs in older children. Chronic gastritis, gastroduodenitis, peptic ulcer disease in children. Etiology, pathogenesis, clinic, diagnosis, treatment, prevention.	2	4	2
Chronic diseases of the hepatobiliary system and pancreas. Pathogenesis, clinic, diagnosis, treatment and prevention.	1	2	1
Diseases of the urinary system in children			

Infections of the urinary system: acute and chronic pyelonephritis, cystitis. Etiology, pathogenesis, clinic, diagnosis, treatment, prevention.	1	4	2
Acute and chronic glomerulonephritis. Chronic kidney disease. Etiology, pathogenesis, clinic, diagnosis, treatment, prevention.	1	2	2
Total hours Module 1 =80	20	40	20
MODULE 2			
Degrees of morphological and neuro-functional maturity of premature children. Peculiarities of adaptation of premature newborns. Organization of care and feeding of premature babies.	2	5	2
Syndrome of respiratory disorders of newborns. Asphyxia of newborns.	1	3	2
Birth trauma of newborns. Etiology, pathogenesis, classification, clinic, diagnosis, primary resuscitation of newborns, treatment, prevention, prognosis.	1	4	3
Hemolytic and hemorrhagic diseases of newborns. Etiology, pathogenesis, classification, clinic, diagnosis, primary resuscitation of newborns, treatment, prevention, prognosis.	2	4	2
Etiological, pathogenetic factors and risk factors in perinatal infectious diseases in newborns. Bacterial infections in newborns. Pneumonia of newborns.	2	3	2
Intrauterine infections of the newborn (TORCH - infections). Protection of medical history.	2	5	3
Iron-, protein- and vitamin-deficiency anemias in children: etiology, pathogenesis, classification, clinic, diagnosis, differential diagnosis, treatment, prevention, prognosis.	1	4	2
Hemorrhagic diseases in children. Hemoblastosis in children. Etiology, pathogenesis, classification, diagnosis, treatment, prognosis.	2	4	3
Diabetes mellitus of various types in children. Etiology, pathogenesis, classification, clinic, diagnosis, differential diagnosis, treatment, prevention, prognosis of diabetes in children. Insulin therapy.	2	5	3
Diabetes: treatment, prevention, prognosis of diabetes in children. Insulin therapy.	1	3	2
Diseases of the thyroid and parathyroid glands in children. Etiology, pathogenesis, clinic, diagnosis, differential diagnosis,	1	3	2
Treatment, prevention of diffuse toxic goiter, hypothyroidism, autoimmune thyroiditis,endemic goiter in children. Goiter degrees.	1	4	2
Diseases of the hypothalamic-pituitary system and gonads in children. Etiology, pathogenesis, classification, clinic, diagnosis, differential diagnosis, treatment, prevention of various clinical forms of growth pathology	2	3	2
Total hours Module 2 =100	20	50	30
MODULE 3			

Differential diagnosis of pneumonia in children. Complications of pneumonia. Leading clinical symptoms and syndromes in various clinical variants and complications of pneumonia in children. Data of laboratory and instrumental studies in various clinical variants of pneumonia and its complications (pleurisy, abscess, pyothorax, pneumothorax). Emergency care for acute respiratory failure in a child.	2	4	3
Differential diagnosis of bronchial obstruction syndrome in children. Leading clinical symptoms and syndromes in bronchial asthma, bronchiolitis and acute obstructive bronchitis in children. Emergency care for status asthmaticus.	2	3	2
Differential diagnosis of cardiomegaly in children. Leading clinical symptoms and syndromes of diseases of the circulatory system in children accompanied by cardiomegaly. Clinical variants of the course and complications of myocarditis, endocarditis, pericarditis, cardiomyopathies, congenital and acquired heart defects in children. Providing emergency care for acute heart failure. Treatment and prevention of chronic heart failure	2	4	3
Differential diagnosis of carditis and heart rhythm in children. Leading clinical symptoms and syndromes in extrasystole, paroxysmal tachycardia, atrial fibrillation, complete atrioventricular block. Clinical variants of the course of paroxysmal tachycardia and atrial fibrillation in children. Data of instrumental studies in extrasystole, paroxysmal tachycardia, atrial fibrillation, complete atrioventricular blockade. Emergency care for paroxysmal rhythm disturbances and Morgana-Adams-Stokes syndrome.	2	4	3
Differential diagnosis of systemic connective tissue diseases and systemic vasculitis in children. Leading clinical symptoms and syndromes in juvenile rheumatoid arthritis, systemic lupus erythematosus, acute rheumatic fever, dermatomyositis, scleroderma, Kawasaki disease, polyarteritis nodosa and other systemic vasculitis in children. Clinical variants of the course and complications of systemic connective tissue diseases and systemic vasculitis in children.	2	4	2
Differential diagnosis of functional and organic diseases of the stomach in children. Leading clinical symptoms and syndromes in functional and organic diseases of the stomach in children (reflux disease, gastritis, peptic ulcer disease of the stomach and duodenum). Clinical - instrumental research and differential diagnosis of dyspeptic, abdominal pain syndrome. Emergency care for the complicated course of peptic ulcer disease in children.	2	4	3
Differential diagnosis of functional and organic intestinal diseases in children. Leading clinical symptoms and syndromes in functional and organic intestinal diseases in children (functional dyspepsia, irritable bowel syndrome, functional constipation,	2	4	2

disaccharidase deficiency, exudative enteropathy, celiac disease, cystic fibrosis, Crohn's disease, nonspecific ulcerative colitis). Clinical-instrumental studies and differential diagnosis of abdominal pain syndrome and intestinal malabsorption syndrome in children.			
Differential diagnosis of diseases of the hepatobiliary system and pancreas in children. Leading clinical symptoms and syndromes in biliary dyskinesia, acute and chronic cholecystitis and chronic hepatitis in children. Clinical variants of the course of biliary dyskinesia, acute and chronic cholecystitis and chronic hepatitis in children. Portal hypertension syndrome. _ Emergency care for acute liver failure.	2	3	2
Differential diagnosis of infectious and inflammatory diseases of the urinary system in children. Leading clinical symptoms and syndromes in infectious-inflammatory diseases of the urinary system (infections of the urinary system, urethritis, cystitis, pyelonephritis), dysmetabolic nephropathies, hereditary tubulopathies (phosphate-diabetes, Debré-de-Tony-Fanconi syndrome, renal diabetes insipidus, renal tubular acidosis) and interstitial nephritis in children. Clinical variants of the course and complications of infectious and inflammatory diseases of the urinary system, interstitial nephritis, dysmetabolic nephropathies and hereditary tubulopathies in children.	2	4	3
Differential diagnosis of acute poststreptococcal glomerulonephritis with Alport's hereditary nephritis, rapidly progressive glomerulonephritis, Berger's disease, etc. Nephrotic syndrome in children: differential diagnosis, complications. Clinical variants of the course of chronic glomerulonephritis in children. Acute and chronic kidney failure in a child - emergency care.	2	4	3
Dispensary supervision of healthy and sick children in polyclinic conditions. Emergency care for major critical - conditions.	2	4	2
Comprehensive medical examination of children of different ages. Organization of palliative care for children with - incurable diseases.	2	4	2
Total hours Module 3 =100	24	46	30
MODULE 4			
Cyrus. Rubella.	1	3	2
Chickenpox. Scarlet fever.		3	2
Mumps infection. Whooping cough.	1	3	2
Diphtheria. Infectious mononucleosis.		3	2
Meningococcal infection. Enterovirus infection.	1	3	2
Acute respiratory viral infections (influenza, parainfluenza, adenovirus, respiratory syncytial, rhinovirus infection.	1	3	4
Shigellosis. Salmonellosis. Escherichia. Staphylococcal enterocolitis. Viral diarrhea.	1	3	2
Viral hepatitis A, B, C, D and others	1	3	2

HIV/AIDS in children. AIDS-opportunistic infections (pneumocystis, candidiasis, cryptococcal infection and others)	1	3	2
TORCH infections (toxoplasmosis, cytomegalovirus infection, herpes infection)	1	3	2
Differential calculation			
Total hours Module 4 =60	8	30	22
Module 5 Practical clinical learning in Pediatrics			
Clinical classes		120	30
Module 6 Practical clinical learning at the student's choice			
Clinical classes		60	30
Exam		5	
Together for discipline =585	72	351	162

TYPES OF STUDENTS' INDEPENDENT WORK

No	Types of SRS	Types of control
MODULE 1		
1.	Rickets, hypervitaminosis "D", spasmophilia: etiology, pathogenesis, clinic, diagnosis, treatment, emergency medical care, prevention of vitamin D deficiency.	Current control in practical classes, credit
2.	Functional gastrointestinal disorders in young children (cyclic vomiting syndrome, functional constipation, functional diarrhea): etiology, pathogenesis, clinic, diagnosis, treatment, prevention.	Current control in practical classes, credit
3.	Acute respiratory infections of the upper respiratory tract: clinic and emergency care for acute stenotic laryngotracheitis, convulsive syndrome, hyperthermic syndrome.	Current control in practical classes, credit
4.	Acute and chronic urticaria in children: etiology, pathogenesis, clinic, diagnosis, treatment. Quincke's edema, anaphylactic shock: first aid.	Current control in practical classes, credit
5.	Infectious bacterial endocarditis in children: etiology, pathogenesis, clinic, diagnosis, treatment, prevention.	Current control in practical classes, credit
6.	Intestinal pathology in children.	Current control in practical classes, credit
7.	Dysmetabolic nephropathy in children: etiology, pathogenesis, clinic, diagnosis, treatment.	Current control in practical classes, credit
8.	Preparation for practical classes	Current control in practical classes
9.	Medical examination and rehabilitation of children with the most common somatic diseases	Test
10.	Curation of patients, writing and defense of academic medical history	Test
11.	Preparation for the test	Test
	In total	
MODULE 2		

1.	Preparation for practical classes in neonatology, diseases of the blood system and endocrine system in children	Current control, settlement
2.	Performing individual work: curation of patients, writing and defense of medical history	Test
3.	Preparation for the final control	Test
	In total	
MODULE 3		
1.	Individual SRS: curation of patients, writing and defense of educational medical history	Exam
2.	Execution of the matriculation "Diagnostic criteria of acute heart failure".	Exam
3.	Implementation of the matriculation "Diagnostic criteria of malabsorption syndrome".	Exam
4.	Execution of the matriculation "Diagnostic criteria of convulsive syndrome".	Exam
5.	Implementation of the matriculation "Diagnostic criteria of systemic vasculitis".	Exam
6.	Implementation of the matriculation "Diagnostic criteria of cardiomyopathy".	Exam
7.	Implementation of the matriculation "Diagnostic criteria of portal hypertension syndrome".	Exam
8.	Execution of the matriculation "Cure of a patient with a congenital heart defect"	Exam
9.	Completion of the matriculation "Treatment of a patient with chronic diseases of the hepatobiliary system and pancreas"	Exam
10.	Implementation of the matriculation "Treatment of a patient with acute and chronic glomerulonephritis"	Exam
	In total	
MODULE 4		
1.	Preparation for practical classes	Current control in practical classes, credit
2.	Treatment of the patient, writing of medical history	Exam
3.	Preparation to the differential calculation	Exam
MODULE 5		
	Preparation for clinical classes	Current control in practical classes, credit
MODULE 6		
	Preparation for clinical classes	Current control in practical classes, credit
	In total	
	Together for discipline	

Individual tasks.

Individual tasks are one of the forms of organization of education at the university, which aims to deepen, generalize and consolidate the knowledge that students receive in the process of learning,

as well as the application of this knowledge in practice. Individual tasks are performed by students independently under the guidance of a teacher.

Individual tasks include: writing essays and creation of multimedia presentations with reports at scientific meetings student circle of the department, participation in the production of macro- and micropreparations, participation in the scientific and research work of the department, participation in writing theses and articles reports at student scientific conferences.

The list of tasks for the individual work of the student: compilation of crosswords from the relevant sections of the academic discipline; in part in the work of the student scientific circle and speeches at scientific forums ; in part in the student Olympiad with disciplines ; n selection of video and audio materials from sections of the academic discipline ; selection of materials and creation of a presentation on a relevant topic or section of the discipline.

Teaching methods.

According to the sources of knowledge, teaching methods are used: verbal - story, explanation, lecture, instruction; visual - demonstration, illustration; practical - practical work, problem solving. According to the nature of the logic of knowledge, methods are used: analytical, synthetic, analytical-synthetic, inductive, deductive. According to the level of independent mental activity, the following methods are used: problem-based, searching, research.

1. Verbal methods: lecture, conversation, interactive lecture;
2. Visual methods: illustration, demonstration, demonstration at the patient's bedside.
3. Practical methods: performing practical work and solving clinical situational tasks to develop skills and abilities; simulation training.
4. Students' independent work on understanding and assimilation of new material
5. Use of control and educational computer programs
6. Innovative teaching methods: Case-based learning (Learning through the analysis of a clinical case, situation); brain storm; educational discussion; educational debate; role play; team-based learning; think-pair-share.

The types of training according to the curriculum are: lectures; practical training; independent work of acquirers.

Control methods.

Current control is carried out on the basis of control theoretical knowledge, practical skills and abilities.

Forms of current control are: *in the* dream survey (frontal, individual, combined), interview; **practical verification of the formed professional skills** (carried out based on the results of solving clinical cases, working with medical documentation, performing practical skills, working at the patient's bedside); **test control** ("open" and "closed" test tasks).

Current control is mandatory. During the evaluation of mastering of each topic from all disciplines of the curriculum for the current educational activity, the student is given grades on a 4-point (traditional scale) taking into account the approved evaluation criteria for the discipline. All types of work provided by the curriculum are taken into account. The student must receive a grade in each topic. The teacher conducts a survey of each student in the group at each lesson and assigns a

grade in the journal of attendance and student performance according to the traditional scale ("5", "4", "3", "2").

When evaluating the student's current educational activity, 20% of the grade is the student's independent work, which takes into account the knowledge of the topic of independent study and the performance of work in the notebook.

The final (summary) control is carried out :

- in the form of a written test, which includes test tasks, theoretical questions
- control of practical skills (solving clinical cases, medical history protection, assessment of correct performance of practical skills - practical-oriented exam.

According to the specifics of professional training, preference is given to test and practically oriented control.

The form of final control of study success.

The final control of the discipline is carried out on the basis of theoretical control knowledge, practical skills and abilities.

Assessment is a form of final control, which consists in assessing the student's learning of the learning material based solely on the results of his performance of certain types of work in practical, seminar or laboratory classes. Semester assessment of subjects is carried out after the end of its study, before the beginning of the examination session.

An exam is a form of final control of a student's assimilation of theoretical and practical material from an educational discipline.

Scheme of calculation and distribution of points received by students.

The maximum number of points for a discipline is 200 points. The ratio between the results of the evaluation of the current educational activity and the final control of knowledge is 60% and 40%.

The first and second semesters of studying the discipline end with a credit.

The maximum number of points that a student can score for the current educational activity while studying the discipline is 200 points, the minimum number of points - the minimum number of points - is 120 points.

The calculation of the number of points is carried out on the basis of the grades received by the student on a 4-point (national) scale during the study of the discipline, by calculating the arithmetic mean, rounded to two decimal places.

The learner receives credit at the last lesson in the discipline based on the results of the current assessment.

Only those students who do not have academic debt and whose average score for the current educational activity in the academic discipline is at least 3.00 are admitted to the credit.

The average grade for the current activity is converted into points on a 200-point scale, according to the conversion table (Table 1).

Table 1. Recalculation of the average grade the current activity into a multi-point scale (for disciplines ending with credit)

4-points scale	200-point scale	4-point scale	200-point scale	4-point scale	200-point scale	4-point scale	200-point scale
5	200	4.47	179	3.94	158	3.42	137
4.97	199	4.44	178	3.92	157	3.39	136
4.94	198	4.42	177	3.89	156	3.37	135
4.92	197	4.39	176	3.87	155	3.34	134
4.89	196	4.37	175	3.84	154	3.32	133
4.87	195	4.34	174	3.82	153	3.29	132
4.84	194	4.32	173	3.79	152	3.27	131
4.82	193	4.29	172	3.77	151	3.24	130
4.79	192	4.27	171	3.74	150	3.22	129
4.77	191	4.24	170	3.72	149	3.19	128
4.74	190	4.22	169	3.69	148	3.17	127
4.73	189	4.19	168	3.67	147	3.14	126
4.69	188	4.17	167	3.64	146	3.12	125
4.67	187	4.14	166	3.62	145	3.09	124
4.64	186	4.12	165	3.59	144	3.07	123
4.62	185	4.09	164	3.57	143	3.04	122
4.59	184	4.07	163	3.54	142	3.02	121
4.57	183	4.04	162	3.52	141	3	120
4.54	182	4.02	161	3.49	140	<3	70-119 (refolding)
4.52	181	4.00	160	3.47	139		
4.49	180	3.97	159	3.44	138		

To learning results is also evaluated on a two-point scale (passed/failed).

Table 2. The scale of transferring points to the national system.

According to the national system	On a 200-point scale
counted	from 120 to 200 points
not counted	less than 119 points

Students' independent work, which is provided for by the topic of the lesson along with classroom work, is evaluated during the current control of the topic in the corresponding lesson.

The last semester of studying the discipline) ends with a final control in the form of an exam.

Only those students who do not have academic debt (all missed classes have been completed) and whose average score for the current educational activity in the academic discipline is at least "3" are admitted to the exam.

The maximum number of points that a student can score for the current educational activity for admission to the exam is 120 points and is defined as the sum of the arithmetic average of all grades received in the semester.

The minimum number of points that a student must score for the current educational activity for admission to the exam is 72 points. Recalculation of the average grade for the current academic performance (on a 120-point scale) in the table 3.

Table 3. Recalculation of the average grade for the current academic performance in a multi-point scale for disciplines ending with an exam.

4-points scale	200-point scale	4-point scale	200-point scale	4-point scale	200-point scale
5	120	4.29	103	3.58	86
4.96	119	4.25	102	3.54	85
4.92	118	4.21	101	3.50	84
4.87	117	4.17	100	3.46	83
4.83	116	4.12	99	3.42	82
4.79	115	4.08	98	3.37	81
4.75	114	4.04	97	3.33	80
4.71	113	4.00	96	3.29	79
4.67	112	3.96	95	3.25	78
4.62	111	3.92	94	3.21	77
4.58	110	3.87	93	3.17	76
4.54	109	3.83	92	3.12	75
4.50	108	3.79	91	3.08	74
4.46	107	3.75	90	3.04	73
4.42	106	3.71	89	3	72
4.37	105	3.67	88	Less than 3	Not enough
4.33	104	3.62	87		

The maximum number of points that a student can score when taking the exam is 80 (minimum number – not less than 50).

Discipline assessment is defined comprehensively as the sum of points for the current educational activity and points for the exam.

From the allocated 120 points for the current educational activity, 4 to 12 additional points are allocated for the assessment of individual independent work of higher education applicants, according to the work curriculum. Encouragement points are added to the final grade for the discipline at the end of its study.

Points from the discipline for students who have successfully completed the program are converted into the national scale and the ECTS system (tables 4, 5).

Table 4

Discipline points	Evaluation on a 4-point scale
From 180 to 200 points	5
From 150 to 179 points	4
From 149 points to the minimum number of points that the student must score	3
Below the minimum number of points that the student must score	2

Table 5. Rating scale: national and ECTS.

The sum of points for all types educational activity	Evaluation of ECTS	Evaluation on a national scale	
		for an exam, a diploma	for credit
180-200	A	perfectly	counted
160-179	B	okay	

150-159	C		
130-149	D	satisfactorily	
120-129	E		
50-119	FX	unsatisfactory with the possibility of refolding	not included with the possibility of refolding
0-49	F	unsatisfactory with mandatory restudy disciplines	not enrolled with mandatory restudy disciplines

Methodical support.

1. Methodical instructions for students for practical classes.
2. Methodological developments and multimedia presentations of lectures.
3. A collection of algorithms for performing practical skills.
4. Collections of test tasks and situational tasks.
5. Copies of the results of general clinical and additional laboratory methods research.
6. Copies of electrocardiograms, radiographs, other results instrumental research methods.
7. Demonstration training videos.
8. Educational manuals, monographs, professional magazines.

LIST OF QUESTIONS FOR THE EXAM

Module 1/course 4 " Pediatrics".

1. Functional dyspepsia in young children: etiology, pathogenesis, classification, clinic, diagnosis, treatment, prevention.
2. Cyclic vomiting syndrome: definition, classification (according to Roman criteria III), etiology, pathogenesis, clinic and diagnosis, treatment, prevention.
3. Intestinal colic in young children: etiology, pathogenesis, clinic, diagnosis, treatment, prevention.
4. Functional fixation in young children: definition, etiology, pathogenesis, clinic, diagnosis, treatment, prevention.
5. Rickets. Definition, etiology, pathogenesis, classification, clinic, diagnosis, treatment. Prevention of rickets.
6. Hypervitaminosis D. Etiology, pathogenesis, clinic, diagnosis, prevention, treatment, emergency care for acute hypervitaminosis D, prognosis.
7. Protein-energy deficiency in children. Definition, classification, clinic, treatment, prevention, prognosis.
8. Acute respiratory infections of the upper respiratory tract (acute nasopharyngitis, acute pharyngitis, acute laryngopharyngitis, acute tracheitis) in children. Etiology, pathogenesis, clinic, diagnosis, treatment and prevention.
9. Acute stenosing laryngotracheitis (croup) in children. Etiology, pathogenesis, clinic and emergency care.
10. Therapeutic measures for fever and convulsions in children with SARS.
11. Acute bronchitis in children. Definition, etiology, pathogenesis, clinic, diagnosis, treatment and prevention.
12. Acute obstructive bronchitis in children. Definition, etiology, pathogenesis, clinic, diagnosis, treatment and prevention.

13. Acute bronchiolitis in children. Definition, etiology, pathogenesis, clinic, diagnosis, treatment and prevention.
14. Recurrent bronchitis in children. Definition, etiology, pathogenesis, clinic, diagnosis, treatment and prevention.
15. Pneumonia in children. Definition, classification, etiology, pathogenesis, clinic, diagnosis, treatment and prevention of pneumonia in children. Forecast.
16. Acute respiratory failure in children. Definition, classification, etiology, pathogenesis, clinic, diagnosis, emergency care.
17. Birth defects and chronic diseases of the bronchopulmonary system in children. Definition, classification, etiology, pathogenesis, clinic, diagnosis, treatment and prevention. Forecast.
18. Atopic dermatitis in children. Definition, classification, etiology, pathogenesis, clinic, diagnosis, treatment and prevention, prognosis. Atopic march.
19. Allergic rhinitis in children. Definition, classification, etiology, pathogenesis, clinic, diagnosis, treatment and prevention, prognosis.
20. Urticaria in children. Definition, etiology, pathogenesis, clinic, diagnosis, treatment, prevention.
21. Bronchial asthma in children. Definition. Risk factors and pathophysiological mechanisms of development of bronchial asthma. Classification, clinic, diagnosis, treatment and prevention of bronchial asthma in children, prognosis.
22. Quincke's edema in children. Etiology, pathogenesis, clinic, diagnosis, emergency care.
23. The most common VVS in children. Etiology, classification of heart defects, hemodynamics in the most common VVS in children (defects of the MSHP, defects of the MPP, tetrad of Fallot, coarctation of the aorta, stenosis of the pulmonary artery, aortic stenosis, transposition of arterial vessels and VAP).
24. Diagnosis of the most common VVS in children. Doctor's tactics and prognosis for the most common VVS in children. Conservative treatment. Indications for cardiosurgical treatment.
25. Diagnosis and treatment of heart failure in children with congenital heart disease. Secondary prevention of infectious endocarditis.
26. Carditis in children: definition, classification, etiology, pathogenesis, clinic, diagnosis, treatment, prognosis.
27. Cardiomyopathies in children: definition, classification, etiology, pathogenesis, clinic, diagnosis, treatment, prognosis.
28. Heart rhythm and conduction disorders in children: classification, causes, clinic, diagnosis, treatment, prognosis.
29. Acute rheumatic fever in children. Definition, classification, etiology, pathogenesis, clinic, diagnosis, treatment, primary and secondary prevention, prognosis.
30. JIA: definition, classification, etiology, pathogenesis, clinic, diagnosis, treatment, rehabilitation, prognosis.
31. Reactive arthropathies in children: definition, classification, etiology, pathogenesis, clinic, diagnosis, treatment, prognosis.
32. Infectious endocarditis in children: definition, classification, etiology, pathogenesis, clinic, diagnosis, treatment, primary and secondary prevention, prognosis.
33. Functional dyspepsia, abdominal pain in older children. Definition, classification, etiology, pathogenesis, clinic, diagnosis, treatment, prevention.
34. Gastroesophageal reflux disease in older children. Etiology, pathogenesis, clinic, diagnosis, treatment, prevention.

35. Organic diseases of the esophagus and stomach in older children. Etiology, pathogenesis, clinic, diagnosis, treatment, prevention.
36. Irritable bowel syndrome and functional constipation in older children. Definition, etiology, pathogenesis, clinic, diagnosis, treatment, prevention, prognosis.
37. Ulcerative colitis and Crohn's disease in children. Etiology, pathogenesis, clinic, diagnosis, treatment, prognosis.
38. Dysfunctions of the gallbladder and sphincter of Oddi in children. Etiology, clinic, diagnosis, treatment and prevention.
39. Etiology, clinic, diagnosis, treatment and prevention of organic diseases of the biliary system in older children.
40. Exocrine pancreatic insufficiency in children. Definition, etiology, pathogenesis, clinic, diagnosis, differential diagnosis, treatment, prevention, prognosis.
41. Acute and chronic pancreatitis in children. Etiology, pathogenesis, clinic, diagnosis, treatment, prevention, prognosis.
42. Infections of the urinary system in children. Definition, classification, differential diagnosis of lower and upper urinary tract infections.
43. Cysts in children. Etiology, pathogenesis, clinic, diagnosis, treatment, prevention, prognosis.
44. Pyelonephritis in children. Definition, etiology, pathogenesis, classification, clinic, diagnosis, treatment, prevention, prognosis.
45. Glomerulonephritis in children. Definition, classification, etiology, pathogenesis, clinic, diagnosis, treatment, prevention, prognosis.
46. Chronic kidney disease in children. Risk factors of occurrence, etiology, pathogenesis, stages of the disease, clinic, diagnosis, treatment, prevention, prognosis.
47. Dysmetabolic nephropathy in children. Definition, classification, etiology, pathogenesis, clinic, diagnosis, treatment, prevention, prognosis.

Module 2/course 5 Pediatrics

1. The concept of "prematurity". Classifications of prematurity.
2. Causes of intrauterine fetal development delay. Peculiarities of adaptation of children with ZVUR and principles of parenting.
3. Assessment of morphological and neuro-functional maturity of premature children (Balard scale).
4. Peculiarities of thermoregulation of premature children, methods of prevention of hypothermia.
5. Prevention and treatment of hypoglycemia in premature babies.
6. Mechanisms of development of huperbilirubinemia in premature infants, possible consequences. Management tactics.
7. Emergency care for apnea in newborns. Indications for artificial lung ventilation. Complications of mechanical ventilation: bronchopulmonary dysplasia, retinopathy of prematurity.
8. Peculiarities of dispensary observation of premature children in the polyclinic. Prevention of anemia, lactase deficiency, rickets.
9. Principles of feeding premature babies. Variants of means of feeding depending on the gestational age and condition of the child. Recommended volumes of enteral nutrition.
10. The concept of newborn asphyxia. Etiology, clinic, pathogenesis of asphyxia. Compensatory mechanisms of the fetal body in response to asphyxia.

11. Criteria for the degree of severity of asphyxia depending on the assessment on the Apgar scale, pH indicators and signs of dysfunction of organs and systems.
12. Algorithm for providing emergency care to a child with birth asphyxia in the presence or absence of signs of meconial aspiration.
13. Definition of the term "birth injury" and factors of its development.
14. Childbirth injuries of soft tissues. Damage to the sternocleidomastoid muscle. Differential diagnosis of obstetric tumor and cephalohematoma.
15. Childbirth trauma of the spinal cord and brachial plexus. Paresis and paralysis of Duchenne – Erb, Dezherin – Klumpke.
16. Differential diagnosis of intracranial hemorrhages in newborns.
17. The concept of the surfactant system of the lungs. Factors in the development of SDR in newborns. Mechanism of development of hyaline membranes. Methods of antenatal prevention.
18. Assessment of the severity of respiratory failure in respiratory distress syndrome using the Silverman and Downes scale.
19. Methods of diagnosis of SDR. X-ray signs of SDR.
20. Principles of treatment of ADHD in newborns. Respiratory support. Surfactant replacement therapy.
21. Classification of pneumonia in newborns depending on the route of infection and etiology. Risk factors for the development of pneumonia in newborns. Pathogenesis.
22. Features of the course of pneumonia in newborns depending on the route of infection and etiology.
23. Principles of diagnosis and treatment of pneumonia in newborns. Features of etiotropic therapy.
24. Etiology and pathogenesis, classification of hemolytic disease of newborns.
25. Clinical and laboratory criteria of anemic, icteric and edematous forms of hemolytic disease of newborns. Criteria for the degree of severity of hemolytic disease of newborns. Stages of the course of bilirubin encephalopathy.
26. Indications for replacement blood transfusion. Technique of operation and its possible complications. Methods of antenatal diagnosis of hemolytic disease of the fetus.
27. Methods of conservative therapy of hemolytic disease of newborns. The mechanism of action of phototherapy. Methods of prevention of hemolytic disease of the fetus.
28. Features of the hemostasis system in newborns. Factors in the development of hemorrhagic disease of newborns. Clinical features of early, classical and late forms of hemorrhagic disease.
29. Differential diagnosis of hemorrhagic disease and "swallowed blood" syndrome. Emergency care for gastrointestinal bleeding. Treatment and prevention of hemorrhagic disease.
30. Definition of the term TORCH - infections. Risk factors for intrauterine infections
31. The nature of the lesion in intrauterine infections depending on the term and route of infection of the fetus.
32. Methods of early diagnosis of intrauterine infections.
33. Clinical manifestations of intrauterine infections depending on etiology (congenital toxoplasmosis, rubella, neonatal herpes and cytomegalovirus infection).
34. Etiotropic treatment and immunotherapy of intrauterine infections.
35. Omphalitis. Etiology, pathogenesis, classification, diagnosis, prevention and treatment.
36. Vesiculopustulosis, pemphigus of the newborn, Ritter's exfoliative dermatitis. Etiology, clinic, prevention and treatment

37. Factors in the development of neonatal sepsis.
38. Classification and etiology of neonatal sepsis.
39. Clinical and laboratory criteria of neonatal sepsis.
40. Principles of treatment and prevention of neonatal sepsis.
41. Definition of the concept of anemia. Classification of anemias in children.
42. Iron deficiency anemia in children. Etiology, clinic, diagnosis, differential diagnosis, laboratory diagnosis.
43. Treatment and prevention of iron deficiency anemia.
44. Chronic posthemorrhagic anemia in children. Etiology, pathogenesis, diagnosis. Emergency care for bleeding.
45. Protein- and vitamin-deficient anemias. Etiology, pathogenesis, diagnosis, treatment.
46. Leukemia in children. Causes of occurrence. Classification of leukemias.
47. Clinical variants of the course, diagnosis, differential diagnosis of acute lymphoblastic leukemia in children.
48. Classification of medicinal products used in the treatment of leukemia. Indications for their use. Complications of cytostatic therapy (immediate, delayed, remote). Palliative care.
49. Classification of hemoblastosis. Lymphogranulomatosis in children. Etiology, pathogenesis, stages of the disease.
50. Diagnosis, differential diagnosis of lymphogranulomatosis in children with other lymphadenopathy, lymphadenitis, hemoblastosis.
51. Clinic, treatment, prognosis of lymphogranulomatosis in children. Emergency care for compression syndrome of the superior vena cava. Palliative care.
52. Classification of hemorrhagic diseases.
53. Hemophilia A and B. Etiology, pathogenesis, diagnosis. Prognosis in children.
54. Replacement therapy in the provision of emergency care to patients with hemophilia. Antihemophilic drugs and their use.
55. Hemorrhagic vasculitis in children. Etiology, pathogenesis, clinical forms, diagnosis, differential diagnosis, treatment, prognosis.
56. Thrombocytopenic purpura in children. Etiology, pathogenesis, clinic, diagnosis, differential diagnosis, treatment, prognosis. Emergency care for bleeding.
57. Diabetes in children Etiology, pathogenesis, clinic, diagnosis, principles of treatment, compensation of diabetes in children.
58. Peculiarities of the course of diabetes in early and teenage years.
59. Regime of insulin therapy for diabetes in children. Insulin preparations.
60. Hyperglycemic ketoacidotic coma in children. Causes, clinic, diagnosis, emergency care. Hypoglycemic coma in children. Causes, clinic, diagnosis, emergency care.
61. Differential diagnosis of hyperglycemic and hypoglycemic coma in children.
62. Growth disorders in children. Pituitary dwarfism. Assessment of height according to centile nomograms. Causes, clinic, differential diagnosis. Treatment and prognosis.
63. Obesity in children. Reasons. Clinical forms. Diagnostics. Treatment. Forecast. Prevention.
64. Autoimmune thyroiditis in children. Etiology, pathogenesis, clinic, diagnosis, differential diagnosis, treatment, prognosis.
65. Diffuse toxic goiter in children. Etiology, pathogenesis, clinic, diagnosis, differential diagnosis, treatment, prognosis.
66. Endemic goiter. Causes, clinic, diagnosis, prevention, treatment, prognosis.
67. Hypothyroidism in children. Etiology, pathogenesis, clinic, early diagnosis, treatment, prognosis.

68. Clinic and diagnosis of congenital hypothyroidism in children. Treatment. Forecast.
69. Clinic and diagnosis of adreno-genital syndrome in children. Treatment. Emergency care for the liver-losing form of adreno-genital syndrome.
70. Disorders of sexual development of boys and girls. Etiology, pathogenesis, clinic, diagnosis, differential diagnosis, treatment.

Module 3/course 6 Emergency Pediatrics

1. Differential diagnosis of pneumonia in children. Patient management tactics in different clinical variants of the course of pneumonia. Prevention of pneumonia complications in children.
2. Differential diagnosis of complications of pneumonia (pleurisy, abscess, pyothorax, pneumothorax) in children. Patient management tactics for various clinical variants of complications of pneumonia in children.
3. Differential diagnosis of obstructive bronchitis and bronchiolitis in children. Patient management tactics for various clinical variants of bronchitis in children.
4. Emergency care for acute respiratory failure depending on the cause and degree of severity.
5. Differential diagnosis of bronchial asthma and bronchial obstruction syndrome against the background of acute respiratory diseases in children of different ages. Patient management tactics in different clinical variants of the course of broncho-obstructive syndrome and its complications in children.
6. Provision of emergency care for status asthmaticus.
7. Prevention of bronchial obstruction syndrome against the background of acute respiratory diseases in children of different ages.
8. Differential diagnosis of chronic, hereditary and congenital diseases of the bronchopulmonary system (cystic fibrosis, primary ciliary dyskinesia, Wilms- Campbell syndrome, bronchomalacia, lung aplasia and hypoplasia, α 1 -antitrypsin deficiency, bronchopulmonary dysplasia, lung sequestration). Tactics of managing a child with hereditary, congenital and chronic diseases of the bronchopulmonary system.
9. Differential diagnosis of inflammatory heart diseases (myocarditis, endocarditis, pericarditis) in children. Tactics of managing a sick child with myocarditis, endocarditis, pericarditis.
10. Differential diagnosis of cardiomyopathies in children. Tactics of managing a sick child with various cardiomyopathies.
11. Differential diagnosis of congenital and acquired heart defects in children. Tactics of managing children with congenital and acquired heart defects.
12. Providing emergency care to children with acute heart failure.
13. Differential diagnosis of extrasystole, paroxysmal tachycardia, atrial fibrillation and complete atrio-ventricular block. Tactics of managing a sick child with extrasystole, paroxysmal tachycardia, atrial fibrillation, complete atrioventricular block. Prevention of heart rhythm and conduction disorders in children.
14. Providing emergency care for paroxysmal tachycardia, atrial fibrillation, MAS syndrome in children.
15. Differential diagnosis of systemic connective tissue diseases in children. Tactics of managing patients with systemic connective tissue diseases in children. Primary and secondary prevention of acute rheumatic fever in children.
16. Differential diagnosis of systemic vasculitis in children. Tactics of managing a child with systemic vasculitis.
17. Differential diagnosis of arthritis in children. Prevention of reactive arthritis in children.

18. Differential diagnosis of functional (cyclic vomiting syndrome, functional dyspepsia) and organic (chronic gastritis, chronic gastroduodenitis, gastric and duodenal ulcer) diseases of the upper digestive tract in children. Tactics of managing children with functional and organic diseases of the upper part of the digestive tract in children. Prevention of ulcer disease and its complications. Provision of emergency care in complicated course of peptic ulcer disease in children
19. Differential diagnosis of functional (abdominal pain, irritable bowel syndrome, functional constipation) and organic (nonspecific ulcerative colitis, Crohn's disease) intestinal diseases in children. Tactics of managing children with functional and organic intestinal diseases.
20. Differential diagnosis of primary (disaccharidase deficiency, exudative enteropathy, celiac disease, cystic fibrosis) and secondary (chronic enteritis, enterocolitis) disorders of intestinal absorption in children. Tactics of managing children with primary and secondary syndrome of impaired intestinal absorption.
21. Differential diagnosis of functional disorders of the biliary tract, acute and chronic cholecystitis in children. Tactics of managing sick children with functional disorders of the biliary tract, acute and chronic cholecystitis. Prevention of functional disorders of the biliary tract.
22. Differential diagnosis of acute and chronic pancreatitis in children. Tactics of managing sick children with acute and chronic pancreatitis. Prevention of acute and chronic pancreatitis in children.
23. Differential diagnosis of chronic hepatitis in children. Tactics of managing a patient with chronic hepatitis in children. Prevention of chronic hepatitis and portal hypertension in children.
24. Providing emergency care to children with acute liver failure and complications of portal hypertension syndrome.
25. Differential diagnosis of the most common infectious and inflammatory diseases of the urinary system (infections of the urinary system, urethritis, cystitis, pyelonephritis). Tactics of managing a sick child with infectious and inflammatory diseases of the urinary system and their complications. Prevention of urethritis, cystitis, pyelonephritis.
26. Differential diagnosis of hereditary tubulopathies (phosphate-diabetes, Debré-de-Tony-Fanconi syndrome, renal diabetes insipidus, renal tubular acidosis) in children. Tactics of managing a sick child with hereditary tubulopathies.
27. Differential diagnosis of dysmetabolic nephropathies in children. Tactics of managing a sick child with dysmetabolic nephropathies.
28. Principles of treatment of chronic kidney disease in children.
29. Emergency aid for acute urinary retention.
30. Differential diagnosis of acute and chronic glomerulonephritis, interstitial and hereditary nephritis in children. Tactics of managing a sick child with acute and chronic glomerulonephritis.
31. Providing emergency care for acutely damaged kidneys in children.
32. The procedure for mandatory preventive examinations of a child under the age of three (normative document). Assessment of physical and psycho-motor development of a child up to three years of age.
33. Rational feeding and nutrition of a child under the age of three. Principles of effective counseling.
34. Tactics of a general practitioner in case of physical and neuropsychological development disorders of children in the first three years of life.

35. Differential diagnosis and prevention of the most common deficiency conditions (rickets, iron-deficiency anemia, protein-energy deficiency) in young children.
36. Preventive vaccinations for children under three years of age.
37. The procedure and terms of mandatory preventive medical examinations of adolescent children.
38. Assessment of physical development and puberty of adolescent children. Prevention of obesity in teenagers. Medical and psychological counseling.
39. Differential diagnosis of primary and secondary arterial hypertension in adolescent children. Tactics of managing a patient with arterial hypertension in the ward.
40. Provision of emergency care for vegetative crises, hypertensive crisis.
41. Organization of palliative care for children with incurable diseases.
42. Psychological, spiritual and social issues of palliative care for children and their relatives with incurable diseases.
43. Peculiarities of the doctor's tactics in providing emergency medical care to children. Features of the examination of the child. Diagnosis of emergency conditions. Specificity of the diagnostic process.
44. Primary resuscitation in case of respiratory arrest. Emergency therapy and order of resuscitation measures in case of respiratory arrest.
45. Atopy and principles of emergency care in anaphylactic conditions.
46. Bleeding and principles of emergency care for children with acute bleeding.
47. Syncope features of doctor's tactics in providing emergency medical care to children.
48. Accidents and peculiarities of the doctor's tactics in providing emergency medical care to children.
49. Organization of preventive vaccinations for children. Contraindications to vaccination. Post-vaccination reactions and complications, their diagnosis and treatment. 50. Anaphylactic shock during vaccination. Diagnostics, emergency care.

Module 4/course 6 Pediatrics Infectious Diseases

1. Concepts of "infection", "infectious process", "infectious disease". Features of infectious diseases.
2. The main stages of the development of infectious diseases. Scientific contribution of domestic and foreign scientists to the study of infectious diseases.
3. Classification of infectious diseases.
4. Principles of diagnosis of infectious diseases.
5. Methods of specific diagnosis of infectious diseases.
6. Preventive measures, principles of immunoprophylaxis of infectious diseases.
7. Principles of treatment of infectious diseases.
8. The structure and mode of operation of the infectious disease hospital. Indications for hospitalization, rules for examination and discharge of patients from an infectious hospital. Peculiarities of maintaining medical documentation.
9. General characteristics of infectious diseases with fecal-oral transmission mechanism.
10. General characteristics of infectious diseases of the respiratory tract.
11. Influenza: etiology, epidemiology, pathogenesis, clinical course, laboratory diagnosis, differential diagnosis, complications, treatment, anti-epidemic measures, principles of immunoprophylaxis. Indications for hospitalization.
12. Parainfluenza: etiology, epidemiology, pathogenesis, clinical course, laboratory diagnosis, differential diagnosis, complications, treatment, prevention. Indications for hospitalization.

13. Adenovirus disease: etiology, epidemiology, pathogenesis, clinical course, laboratory diagnosis, differential diagnosis, complications, treatment, prevention. Indications for hospitalization.
14. MS infection: etiology, epidemiology, pathogenesis, clinical course, laboratory diagnosis, differential diagnosis, complications, treatment, prevention. Indications for hospitalization.
15. Rhinovirus infection: etiology, epidemiology, pathogenesis, clinical course, laboratory diagnosis, differential diagnosis, complications, treatment, prevention. Indications for hospitalization.
16. Classification of human herpes viruses. General characteristics of herpesvirus diseases.
17. Herpetic infection: etiology, epidemiology, pathogenesis, classification, clinical course, laboratory diagnosis, differential diagnosis, complications, treatment, prevention. Indications for hospitalization.
18. Varicella. Herpes zoster. Etiology, epidemiology, pathogenesis, clinical course, laboratory diagnosis, differential diagnosis, complications, treatment, prevention. Indications for hospitalization, rules for discharge of patients from the hospital.
19. Infectious mononucleosis: etiology, epidemiology, pathogenesis, classification, clinical course, laboratory diagnosis, differential diagnosis, complications, treatment, prevention. Indications for hospitalization.
20. Peculiarities of the course of herpesvirus infections in patients with HIV/AIDS.
21. Measles: etiology, epidemiology, pathogenesis, classification, clinic, features of the course in adults, laboratory diagnosis, differential diagnosis, complications, treatment, anti-epidemic measures, principles of immunoprophylaxis. Indications for hospitalization, rules for discharge of patients from an infectious hospital.
22. Rubella: etiology, epidemiology, pathogenesis, classification, clinic, features of the course in adults, laboratory diagnosis, differential diagnosis, complications, treatment, anti-epidemic measures, principles of immunoprophylaxis. Indications for hospitalization, rules for discharge of patients from an infectious hospital.
23. Viral mumps: etiology, epidemiology, pathogenesis, classification, clinic, features of the course in adults, laboratory diagnosis, differential diagnosis, complications, treatment, anti-epidemic measures, principles of immunoprophylaxis. Indications for hospitalization, rules for discharge of patients from an infectious hospital.
24. Diphtheria: etiology, epidemiology, pathogenesis, classification, clinical course, laboratory diagnosis, differential diagnosis, complications, treatment, principles of immunoprophylaxis. The procedure for hospitalization, the rules for discharge from an infectious hospital.
25. Meningococcal infection: etiology, epidemiology, pathogenesis, classification, clinical course, laboratory diagnosis, differential diagnosis, complications, principles of treatment of various clinical forms, emergency care at the prehospital stage, prevention. Procedure for hospitalization, rules for discharge of patients from an infectious hospital.
26. ITSH: definition, pathogenesis, classification, clinical and laboratory diagnosis, principles of treatment, emergency care at the pre-hospital stage.
27. Edema-swelling of the brain (NNGM) : definition, pathogenesis, classification, clinical and laboratory diagnosis, principles of treatment, emergency care at the pre-hospital stage.
28. Respiratory mycoplasmosis: etiology, epidemiology, pathogenesis, classification, clinical course, laboratory diagnosis, differential diagnosis, complications, principles of treatment of various clinical forms, prevention. Indications for hospitalization.

29. Ornithosis: etiology, epidemiology, pathogenesis, classification, clinical course, laboratory diagnosis, differential diagnosis, complications, principles of treatment of various clinical forms, prevention. Indications for hospitalization.
30. Legionellosis: etiology, epidemiology, pathogenesis, classification, clinical course, laboratory diagnosis, differential diagnosis, complications, principles of treatment of various clinical forms, prevention. Indications for hospitalization.
31. Acute respiratory failure: definition, classification, pathogenesis, clinical and laboratory diagnosis, principles of treatment, emergency care at the prehospital stage.
32. General characteristics of blood infectious diseases.
33. VHA: etiology, epidemiology, pathogenesis, classification, clinical course, laboratory diagnosis, differential diagnosis, complications, principles of treatment, immunoprophylaxis. Indications for hospitalization, rules for discharge of patients from the hospital.
34. VGE: etiology, epidemiology, pathogenesis, classification, clinical course, laboratory diagnosis, differential diagnosis, complications, principles of treatment, prevention. Indications for hospitalization, rules for discharge of patients from an infectious hospital.
35. HBV: etiology, epidemiology, pathogenesis, classification, clinical course, laboratory diagnosis, differential diagnosis, complications, principles of treatment, anti-epidemic measures, principles of immunoprophylaxis, prognosis. Indications for hospitalization, rules for discharge of patients from an infectious hospital.
36. HCV: etiology, epidemiology, pathogenesis, classification, clinical course, laboratory diagnosis, differential diagnosis, complications, principles of treatment, prevention, prognosis. Indications for hospitalization, rules for discharge of patients from an infectious hospital.
37. IOP: etiology, epidemiology, pathogenesis, classification, clinical course, laboratory diagnosis, differential diagnosis, complications, principles of treatment, prevention, prognosis. Indications for hospitalization, rules for discharge of patients from an infectious hospital.
38. Differential diagnosis of jaundice.
39. Fulminant viral hepatitis: pathogenesis, clinical and laboratory diagnosis, principles of treatment.
40. Chronic viral hepatitis: etiology, epidemiology, pathogenesis, classification, clinical course, laboratory diagnosis, differential diagnosis, principles of treatment, prognosis.
41. HIV infection: etiology, epidemiology, pathogenesis, classification, clinical course, laboratory diagnosis, differential diagnosis, complications, principles of treatment, prevention, prognosis. The procedure of hospitalization, examination, dispensation.
42. AIDS-associated protozoan invasions: cryptosporidiosis, isosporosis, cerebral toxoplasmosis. Clinical and laboratory diagnostics. Principles of treatment and prevention. Indications for hospitalization.
43. AIDS-associated mycoses: candidiasis, pneumocystis pneumonia, cryptococcosis. Clinical and laboratory diagnostics. Principles of treatment and prevention. Indications for hospitalization.

Module 5/course 6 Practical clinical learning in Pediatrics

1. Overview of clinical pediatrics: scope and principles.
2. Growth and development milestones in children.
3. Pediatric history taking and physical examination.

4. Immunization schedules and vaccine-preventable diseases.
5. Common infections in childhood and their management.
6. Pediatric nutritional requirements and disorders.
7. Breastfeeding and infant feeding practices.
8. Developmental screening and early intervention.
9. Common pediatric dermatological conditions.
10. Pediatric ENT disorders: diagnosis and management.
11. Asthma and allergic disorders in children.
12. Pediatric gastrointestinal disorders.
13. Congenital anomalies and their management.
14. Genetic disorders in pediatrics.
15. Pediatric endocrine disorders.
16. Pediatric renal and urinary tract disorders.
17. Hematological disorders in children.
18. Pediatric cardiac disorders: congenital and acquired.
19. Neurodevelopmental disorders in children.
20. Autism spectrum disorders: diagnosis and management.
21. Pediatric neurology: seizures and epilepsy.
22. Cerebral palsy: management and rehabilitation.
23. Pediatric musculoskeletal disorders.
24. Pediatric rheumatological conditions.
25. Acute lymphoblastic leukemia in children.
26. Pediatric solid tumors: diagnosis and treatment.
27. Pediatric emergency care.
28. Pediatric critical care: principles and practices.
29. Pain management in children.
30. Pediatric palliative care.
31. Child abuse and neglect: identification and management.
32. Pediatric mental health disorders.
33. ADHD in children: diagnosis and management.
34. Pediatric sleep disorders.
35. Infectious diseases in the pediatric population.
36. Vaccination hesitancy and challenges.
37. Pediatric obesity: prevention and management.
38. Type 1 and Type 2 diabetes in children.
39. Adolescent medicine: unique considerations.
40. Transition of care for chronic pediatric conditions.
41. Global child health issues.
42. Pediatric dermatology: eczema and skin infections.
43. Pediatric ophthalmology: common eye disorders.
44. Pediatric otolaryngology: hearing and speech disorders.
45. Sudden infant death syndrome (SIDS).
46. Pediatric environmental health.
47. Child and adolescent behavioral therapies.
48. Psychopharmacology in children and adolescents.
49. Pediatric infectious disease emergencies.
50. Common pediatric surgical conditions.

51. Pediatric anesthesia considerations.
52. Pediatric radiology: interpretation and safety.
53. Management of common pediatric fractures.
54. Pediatric poisoning and toxicology.
55. Pediatric HIV/AIDS: management and prevention.
56. Tuberculosis in children.
57. Malaria and other tropical diseases in children.
58. Pediatric travel medicine.
59. Pediatric telemedicine and digital health.
60. Ethical issues in pediatric care.
61. Pediatric health policy and advocacy.
62. Pediatric healthcare disparities.
63. Community pediatrics and child health promotion.
64. Pediatric preventive care.
65. Pediatric patient safety and quality improvement.
66. Pediatric procedural skills.
67. Communication skills in pediatric care.
68. Pediatric simulation training.
69. Multidisciplinary team approach in pediatrics.
70. Pediatric dermatology: acne and other common conditions.
71. Pediatric sports medicine.
72. Overuse injuries and prevention in pediatric athletes.
73. Pediatric fluid and electrolyte management.
74. Neonatal care and common neonatal conditions.
75. Pediatric vaccination controversies and myths.
76. Pediatric oncology: supportive care.
77. Pediatric bone marrow transplantation.
78. Emerging infectious diseases in pediatrics.
79. Antibiotic resistance in pediatric infections.
80. Pediatric gastroenterology: inflammatory bowel disease.
81. Pediatric hepatology: liver diseases and transplantation.
82. Pediatric nephrology: acute and chronic kidney diseases.
83. Pediatric urology: congenital anomalies and infections.
84. Pediatric endocrinology: growth disorders.
85. Pediatric allergy: food allergies and anaphylaxis.
86. Pediatric pulmonology: cystic fibrosis.
87. Pediatric cardiology: heart failure and cardiomyopathies.
88. Pediatric neurology: headaches and migraines.
89. Pediatric genetic counseling.
90. Pediatric pharmacology and drug dosing.
91. Health maintenance in children and adolescents.
92. Pediatric orthopedics: scoliosis and limb deformities.
93. Pediatric rehabilitation: techniques and goals.
94. Pediatric social work and family support services.
95. Children with special healthcare needs.
96. Pediatric dermatology: birthmarks and vascular anomalies.
97. Pediatric ENT: tonsillitis and adenoid problems.

98. Pediatric ophthalmology: strabismus and amblyopia.
99. School health and pediatric health education.
100. Research and evidence-based practice in clinical pediatrics.

Module 6/course 6 Practical clinical learning at the student's choice

Questions for Neonatology:

1. Definitions of neonatology and its role in medicine.
2. Physiological characteristics of the newborn.
3. Early care of the newborn: procedures and assessment.
4. Assessing the maturity of the newborn: scales and methods.
5. Respiratory problems in newborns: causes and treatment.
6. Thermoregulation disorders in newborns.
7. Jaundice in newborns: etiology, diagnosis, and treatment.
8. Hypoglycemia in newborns: causes, diagnosis, and treatment.
9. Infections in the neonatal period: identification and treatment.
10. Perinatal asphyxia and its consequences.
11. Congenital heart defects: diagnosis and management.
12. Metabolic disorders in newborns.
13. Early nutritional care of newborns.
14. Breastfeeding: benefits and challenges.
15. Artificial feeding of newborns: when and how.
16. Care for preterm infants: challenges and strategies.
17. Retinopathy of prematurity: causes, prevention, and treatment.
18. Intracranial hemorrhages in preterm infants.
19. Bronchopulmonary dysplasia: causes and management.
20. Congenital infections: cytomegalovirus, toxoplasmosis, others.
21. Neurological disorders in newborns.
22. Genetic disorders in newborns: identification and management.
23. Care of the newborn with low birth weight.
24. Sudden Infant Death Syndrome (SIDS): causes and prevention.
25. Obstetric and neonatal care in multiple pregnancies.
26. Electrolyte disorders in newborns.
27. Pharmacotherapy in neonatology: principles and challenges.
28. Supporting the family of a newborn in the hospital.
29. Ethical aspects of neonatal care.
30. Advanced respiratory support for newborns: techniques and guidelines.
31. Skin care and management of skin disorders in newborns.
32. Gastrointestinal disorders in newborns: diagnosis and treatment.
33. Renal and urinary tract disorders in the neonate.
34. Hematological disorders in newborns.
35. Neonatal pain assessment and management.
36. Vaccinations in the neonatal period.
37. Neonatal surgical conditions and their management.
38. Ophthalmological problems in newborns.
39. Hearing impairment in newborns: screening and management.
40. Developmental care in the neonatal intensive care unit.
41. Ethical dilemmas in end-of-life care for newborns.

42. Neonatal transport: principles and practices.
43. The role of neonatal nursing.
44. Parental education and support in neonatal care.
45. Advances in neonatal technology and treatment.
46. Follow-up and long-term outcomes for high-risk neonates.
47. Psychosocial issues in neonatal intensive care.
48. Infection control in the neonatal unit.
49. Quality improvement and safety in neonatal care.
50. Research and evidence-based practice in neonatology.

Pediatric endocrinology:

1. Overview of pediatric endocrinology: scope and significance.
2. Development of the endocrine system in children.
3. Hypothalamic-pituitary axis: function and disorders.
4. Growth disorders: causes, diagnosis, and treatment.
5. Pediatric thyroid disorders: hypothyroidism and hyperthyroidism.
6. Congenital adrenal hyperplasia: pathophysiology and management.
7. Disorders of calcium and phosphate metabolism in children.
8. Vitamin D deficiency and rickets in children.
9. Diabetes mellitus in children: Type 1 and Type 2.
10. Insulin therapy and glucose monitoring in pediatric diabetes.
11. Hypoglycemia in children: causes and management.
12. Obesity in children: endocrine perspectives and treatment.
13. Metabolic syndrome in the pediatric population.
14. Puberty: normal and abnormal development.
15. Delayed and precocious puberty: evaluation and treatment.
16. Endocrine disorders in neonates.
17. Turner syndrome: clinical features and management.
18. Klinefelter syndrome and other sex chromosome disorders.
19. Disorders of sex development: diagnosis and management.
20. Adrenal insufficiency in children.
21. Cushing syndrome in the pediatric population.
22. Pituitary tumors in children: diagnosis and treatment.
23. Endocrine effects of systemic diseases and syndromes.
24. Autoimmune endocrine disorders in children.
25. Endocrine hypertension in children.
26. Bone health in children: disorders and management.
27. Genetic disorders affecting the endocrine system.
28. Endocrine disruptors and their impact on child health.
29. Neuroendocrine regulation and disorders in children.
30. Pediatric lipid disorders: evaluation and management.
31. Endocrine aspects of childhood cancer survivors.
32. Psychosocial aspects of chronic endocrine diseases in children.
33. Transition care for adolescents with endocrine disorders.
34. Pediatric endocrine emergencies: identification and management.
35. Pharmacotherapy in pediatric endocrinology.
36. Advances in pediatric endocrine diagnostic techniques.

37. Endocrine function tests in children: indications and interpretation.
38. Growth hormone deficiency and therapy in children.
39. Thyroid nodules and cancer in children.
40. Endocrine aspects of pediatric HIV/AIDS.
41. Endocrinopathies in critically ill children.
42. Nutritional deficiencies and their endocrine effects.
43. Pediatric endocrine effects of environmental and lifestyle factors.
44. Ethical issues in pediatric endocrinology.
45. Research trends in pediatric endocrinology.
46. Endocrine screening in newborns and infants.
47. Multidisciplinary approach in pediatric endocrinology care.
48. Endocrine implications of pediatric eating disorders.
49. Technological advancements in pediatric endocrinology treatment.
50. Continuous education and updates in pediatric endocrinology.

List of practical skills:

1. Prescribing a diet for a child suffering from hypotrophy.
2. Calculation of the dose of vitamin D for the treatment and prevention of rickets.
3. Emergency care for rachitogenic tetany.
4. Emergency care for hypervitaminosis D.
5. Emergency care for hyperthermic (febrile) convulsions.
6. Providing emergency care for neurotoxicosis in children.
7. Providing care for children with infectious diseases.
8. Calculation of the required volume of infusion solutions for the correction of water-electrolyte metabolism disorders in intestinal toxicosis of varying degrees of severity.
9. Evaluation of the results of inflammatory analysis of blood, urine, urine according to Nechiporenko, Zimnytskyi, coprograms, intragastric N-metry, markers of inflammation.
10. Evaluation of the results of X-ray examination of chest organs in pneumonia and their complications.
11. Appointment of rehabilitation measures for children with somatic pathology of the respiratory tract.
12. Providing emergency care for hyperthermia in children.
13. Providing emergency care for respiratory failure.
14. Provision of emergency care for asthmatic status.
15. Rules for conducting oxygen therapy.
16. Rules for conducting antibiotic or antiviral therapy.
17. Rules for elimination of valvular pneumothorax.
18. Rules for pleural puncture in children.
19. Determination of the activity of the rheumatic process.
20. Calculation of therapeutic dose and saturation dose of cardiac glycosides.
21. Providing emergency care in case of an attack of Morganhi-Adams-Stokes.
22. Provision of emergency aid in case of paroxysmal tachycardia.
23. Appointment of a course of ferrotherapy for anemia in children.
24. Providing emergency care for acute kidney failure.
25. Correction of azotemia in acute renal failure.
26. Providing emergency care for gastrointestinal bleeding accompanying peptic ulcer disease.

27. Providing emergency care for vomiting syndrome in children.
28. Issuing, entering the medical history of a child who is in a hospital, issuing a discharge, a list of appointments.
29. Assessment of the severity of the sick child's condition.

Recommended Books

1. Pediatrics. Textbook for students of IV level higher medical educational institutions accreditation/ Ed. Prof. O. V. Tyazhkoi / 5th edition. - Vinnytsia: Nova Kniga, 2018. - 1152 p.
2. Pediatrics: National textbook: in 2 vols. Volume 1. Edited by Professor V.V. Berezhny, K., 2013. – 1040 p.
3. Pediatrics: National textbook: in 2 vols. Volume 2. Edited by Professor V.V. Berezhny, K., 2013. – 1024 p.
4. Pediatrics, children's infections in questions and answers. : Tutorial. - Ternopil: TDMU: Ukrmedknyga, 2019. - 307 p.
5. Modern approaches to vaccine prevention of infectious diseases in children and adults printed. Study guide for students of 4th, 6th courses of medical faculties, a also intern doctors, pediatricians, family doctors./- Kryuchko T.O., Dubynska H.M., Koval T.I., Tkachenko O.Ya - Lviv: Magnolia 2006", 2020.-108 p.
6. Infectious diseases in children: textbook/L.I. Chernyshova and others; edited by L.I. Chernyshova. - K.: VSV "Medicine", 2016. - 1016 pp. + 6 pp. color incl.
7. Infectious diseases in children / Ed. S. O. Kramarev and O. B. Nadragy. - M.: Medicine, 2016. – 392 p.
8. Nephrology of childhood: a study guide / T. V. Stoeva [etc.]; under the editorship T. V. Stoeva - Odesa: Politechperiodika, 2018. - 181 p. : tabl., ill., color photo.
9. Emergency medicine. Emergency (quick) medical assistance: national a textbook for doctors-students of postgraduate education, doctors-interns and students of higher medical educational institutions of the IV level of accreditation / I. S. Zozulya [etc.]; under the editorship I.S. Cuckoos - 3rd ed., revised. and added - Kyiv: Medicine, 2017. - 958 p. : ill, tab.
10. Children's nephrology: educational and methodological manual for interns, children's doctors nephrologists, doctors-students of postgraduate education institutions / D. D. Ivanov. - Dnipropetrovsk: T.K. Serednyak, 2014. - 323 p. : tab., fig.
11. Pediatrics: education. manual [for students honey. of higher education honey. education closing III-IV levels accreditation]: in 2 volumes / M.L. Aryaev, N.V. Kotova, N.Yu. Gornostaeva, Yu.V. Dsiatska, L. E. Kaplina and others; under the editorship M.L. Aryaeva, N.V. Kotova; Odessa national honey. Univ. - Odesa: ONMedU, 2014 - Volume 1: Neonatology. Hematology. Endocrinology. - 2014. - 154 p. : table, fig.
12. Pediatrics: education. manual [for students honey. of higher education honey. education closing III-IV levels accreditation]: in 2 volumes / M.L. Aryaev, N.V. Kotova, N.Yu. Gornostaeva, Yu.V. Desyatska, L.E. Kaplin and others; under the editorship M.L. Aryaeva, N.V. Kotova; Odessa national honey. Univ. - Odesa: ONMedU, 2014 - Volume 2: Diseases of young children. Pulmonology. Allergology. Cardiology. Gastroenterology. Nephrology. HIV infection. Primary health care. - 2014. - 311 p. : illustration, table.
13. Propedeutic pediatrics: a textbook for students of higher medical education institutions of the IV level of accreditation / V. G. Maidannyk [etc.]. - 2nd ed., ed. and added - Vinnytsia: Nova kn., 2018. - 871 p. : tab., fig.
14. Clinical examination of a child: a study guide for students of higher education institutions / O. V. Katilov [and others]. - 2nd edition. - Vinnytsia: Nova kn., 2019. - 518 p. : tab., fig.

List of orders of the Ministry of Health of Ukraine :

1. Order No. 362 of the Ministry of Health of Ukraine "On approval of protocols for the diagnosis and treatment of cardiorheumatic diseases in children" dated July 19, 2005.
2. Order of the Ministry of Health of Ukraine dated 22.10.2012 No. 832 "Unified clinical protocol of medical care for children with juvenile arthritis"
3. Order No. 9 of the Ministry of Health of Ukraine "On approval of protocols for diagnosis and treatment of rickets in children" dated January 10, 2005.
4. Order No. 59 of the Ministry of Health of Ukraine "On the approval of unified clinical protocols of medical care for children with diseases of the digestive organs" dated January 29, 2013.
5. Order No. 868 of the Ministry of Health of Ukraine "Unified clinical protocol of primary, secondary (specialized) medical care for bronchial asthma in children" dated October 8, 2013
6. Order No. 670 of the Ministry of Health of Ukraine "Unified clinical protocol of primary, secondary (specialized), tertiary (highly qualified) medical care for atopic dermatitis in children dated July 4, 2016
7. Order No. 627 of the Ministry of Health of Ukraine "On approval of the treatment protocol for children with urinary system infections and tubulointerstitial nephritis" dated November 3, 2008.
8. Order No. 436 of the Ministry of Health of Ukraine on the approval of clinical protocols for the treatment of children in the specialty "Pediatric Nephrology" dated August 31, 2004

Approved:

В.о.Ректора /Acting Rector Dmytro Govsieiev