Odesa National Medical University  
Faculty of Medicine  
Department of Pediatric Surgery  
Syllabus of the course "Instrumental research methods in pediatric surgery"

<table>
<thead>
<tr>
<th>Volume</th>
<th>1,5 ECTC credits, 45 hours: practical lessons - 20 hours, independent work -25 hours.</th>
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<tbody>
<tr>
<td>Term, year</td>
<td>XI, XII terms; 6</td>
</tr>
<tr>
<td>Days, time, place:</td>
<td>According to the schedule of classes with a cyclical form of training</td>
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<tr>
<td>Contact phone number</td>
<td>098 343 90 84</td>
</tr>
<tr>
<td>E-mail:</td>
<td><a href="mailto:avm.dok@ukr.net">avm.dok@ukr.net</a></td>
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<tr>
<td>Workplace</td>
<td>Department of Pediatric Surgery, training rooms</td>
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| Consultations   | Thursday 14: 30-16:00 Saturday 09: 00-13: 00  
Consultations and working off of missed classes are carried out according to the schedule of consultations and working off (the schedule can be found at the link https://info.odmu.edu.ua/chair/pediatric_surgery/) |

**COMMUNICATION**  
Practical training takes place at MTeams.  
Calendar-thematic plans of practical classes and lectures are in the materials of the department in the blog of the ONMedU library: https://info.odmu.edu.ua/chair/pediatric_surgery/. Written assignments will be sent to the Classroom. Send written work to avm.dok@ukr.net. Personal meetings during quarantine are not provided.  
The tests take place online at MTeams.  

**COURSE ANNOTATION**  
The subject of the discipline is instrumental research methods in pediatric surgery.
**Prerequisites:** to master the discipline, knowledge, skills and abilities of such disciplines as human anatomy, histology, embryology, microbiology, physiology, topographic human anatomy, propedeutics of childhood diseases, childhood infectious diseases and those integrating with these disciplines are required;

**Postrequisites:** knowledge, skills and abilities in the discipline of "pediatric surgery" are necessary for the study of pediatrics, surgery, infectious diseases, and resuscitation.

**The aim of the "Instrumental research methods in pediatric surgery" course** is the assimilation of theoretical and practical knowledge on etiology, pathogenesis, typical and atypical clinical manifestations, diagnostic methods in children within the limits corresponding to the training of a general practitioner, taking into account the characteristics of his specialty.

**Discipline objectives:**
1. Determination of the tactics of examination and management of a child with surgical pathology.
2. Diagnosis of emergency conditions in the clinic for pediatric surgery and the provision of emergency medical care to a child with surgical pathology.
3. Identification of various clinical manifestations of complications and establishment of preliminary diagnoses using instrumental research methods in children with surgical pathology.

**Expected results**
As a result of studying the discipline, students should be able to:
1. Interpret ultrasound data.
2. Interpret the data of fibroesophagogastroduodenoscopy.
3. Interpret X-ray data (general, contrast).
4. Interpret the data of bronchography, tracheobronchioscopy.
5. Interpret computed tomography data.
6. Interpret angiographic data.
7. Interpret the data of radioisotope research methods.
8. Interpret the data of pH-metry, manometry.
9. Interpret the data of excretory urography, cystoureterography, and cystoureteroscopy.
10. To examine the child with malformation of the esophagus, diaphragmatic hernia and lobar emphysema.
11. To identify the features of the course of malformations.
DESCRIPTION OF THE COURSE
The course will be presented in the form of practical exercises and student independent work. On the 6th year in the specialty "General Medicine" 1.5 credits (45 hours): practical lessons - 20 hours, student's independent work - 25 hours. During the teaching of the discipline, the following teaching methods are used: lectures, explanations, multimedia presentations, photo assignments, situational teaching, simulation training, oral questioning, testing, individual assignments, and independent work with a textbook. Consultations are held individually on days according to the schedule of consultations and workouts.

Content of the initial discipline:
1. Instrumental research methods in children with surgical pathology of the respiratory system.
2. Instrumental research methods in children with surgical pathology of the chest organs.
3. Instrumental research methods in children with surgical pathology of the abdominal organs.
4. Instrumental research methods in children with surgical pathology of the urinary system.
5. Instrumental research methods in children with surgical pathology of the reproductive system.
6. Instrumental research methods in children with surgical pathology of the musculoskeletal system.

List of recommended literature
Main literature:

Additional literature:
1. Emergency surgery of the abdominal organs (organization standards and professionally oriented algorithms for the provision of medical care) / Ed. Fomina


ASSESSMENT

Assessment of the current educational activity. The current educational activity of the student is assessed on a 4-point (traditional) scale. At the end of the study of the discipline, the current progress is calculated as the average score of all the marks received by the student on the traditional scale, rounded to 2 (two) decimal digits. The daily assessment of the current educational activity consists of an assessment of writing tests from the KROK 2 database, patient examination protocols, writing a
medical history (with virtual distance learning), theoretical protocols, oral answers during an online practical lesson, interpretation of blood tests, CMP, solving clinical problems.

The mark "excellent" is given if the student knows the content of the lesson and the lecture material in full, giving detailed answers and laying out the material without errors and inaccuracies, freely solves problems and performs practical skills of varying degrees of difficulty.

The mark "good" is given if the student knows the content of the lesson and the lecture material almost in full, giving correct, but not complete answers to the questions. Solves problems and performs practical skills without significant errors.

The mark "satisfactory" is given if the student knows the content of the lesson and the lecture material in full. They don’t study the material systematically, but answer the clarifying questions correctly. Solve problems with mistakes and perform practical skills.

The mark "unsatisfactory" is given if the student does not know the content of the lesson and lecture material, solves problems with significant errors and performs practical skills.

A multi-point scale characterizes the actual success of each student in mastering the academic discipline. Conversion of the traditional grade in the discipline into 200 points is carried out by the information and computing center of the university according to the "Contingent" program based on the formula:

<table>
<thead>
<tr>
<th>Traditional grade</th>
<th>Points</th>
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<tbody>
<tr>
<td>«5»</td>
<td>185 - 200</td>
</tr>
<tr>
<td>«4»</td>
<td>151 - 184</td>
</tr>
<tr>
<td>«3»</td>
<td>120 - 150</td>
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</table>

**Assessment of individual student assignments.** Grade for individual assignments is awarded to a student only if they are successfully completed and supported. The grade is added to the current grades.

**Assessment of students' independent work.** Independent work of students, which is provided by the topic of the lesson along with classroom work, is assessed during the current control of the topic in the corresponding lesson. The assimilation of topics that are taken out only for independent work is checked during the exam or differential credit. During training, students fill out the CDS notebook (answers to questions, solving situational problems in accordance with the topic for independent analysis).

**Final control (exam).** Students are admitted to the exam if they have attended all the classroom trainings provided by the curriculum for the discipline, wrote tests on the KROK 2 database (more than 90%), a medical history (for virtual distance
learning) and an SRS exercise book. The exam provides an oral answer to a ticket, in which there are two theoretical questions and one situational task. The examiners are the professor and associate professors of the department, according to an individual schedule. The maximum score is 5.0. The exam is considered completed if the student has received a grade of at least 3.0. The grade for the discipline consists of two components: • 50% - current progress (the arithmetical mean of all the student's grades); • 50% mark on the exam.

COURSE POLICY

Deadline and retakes policy. Students must complete all missed classroom lessons within 2 weeks from the date of absence. For students who have no more than 2 passes without a valid reason, can retake the class within 2 weeks without the permission of the dean. Students who have not completed the missed classes within 2 weeks from the day of admission are not allowed to classes without the permission of the dean of the faculty. Students who have more than 2 absences without a valid reason are not allowed to study and work without the permission of the dean of the faculty. Students who have missed classes for a good reason for more than 2 days can work them according to an individual schedule drawn up by the department and approved by the dean of the faculty. The missed practical lessons are worked out by the student upon presentation of the student card to the teacher on duty according to the schedule of the department work: during the semester - twice a week (on Thursdays and Saturdays - the day of work and consultations). During the semester on Thursday, no more than 1 lesson, on Saturday - no more than 3 (note: Thursday - 14.30-16.00, Saturday - 9.00-13.00). The student has the right only for the period of temporary termination of classroom studies (for the period of distance learning) to work off academic debt without the permission of the dean. The lesson is completed if the student has received a positive mark.

Academic Virtue Policy. Observance of academic virtue by applicants for education provides for: independent fulfillment of educational tasks, tasks of current and final control of learning outcomes; links to sources of information when using ideas, developments, statements, information. It is unacceptable for participants to use prohibited auxiliary materials or technical means (cribs, notes, earpieces, phones, smartphones, tablets, etc.) during control events.

Attendance and late arrivals policy. Attendance at practical classes is compulsory. If a student is late for classes, they can be present at the lesson with a note of their absence on the lesson.

Mobile devices. During the lesson, the use of mobile devices is prohibited.

Audience behavior. In the classroom, the student must behave in accordance with the rules of ethics and conduct defined in the Regulations on the organization of the educational process by applicants for higher education at ONMU and the Regulations on the organization of humanitarian education and educational work at the Odesa National Medical University.