

Ministry of Health of Ukraine  
**Odessa National Medical University**  
**Department of Internal medicine № 1**

**Syllabus course**

**"Actual issues of management of patients with cardiac pathology"**

|                                                    |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
|----------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Scope of the academic discipline</b>            | Total number of hours per discipline: 90 hours (3 credits)<br>Semesters: VII - VIII<br>4th year of study.                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |
| <b>Days, time, place of educational discipline</b> | According to the schedule of classes.<br>Department of Internal Medicine No.1<br>Odesa, str. Zabolotnogo 26. Municipal non-commercial enterprise "Odesa Regional Clinical Hospital" of the Odesa Regional Council, 9th floor building, 7th floor.                                                                                                                                                                                                                                                                                                                                      |
| <b>Teacher(-s)</b>                                 | <b>Head of the department:</b> Karpenko Yurii Ivanovych, DM, professor, Honored doctor of Ukraine, head of the Regional Cardiosurgical Center «Odesa Regional Clinical Hospital»<br><b>Professor:</b> Zolotaryova N.A, Izha H.M<br><b>Associate professors:</b> Savelieva O.V. DM, Kryzhanovskiy Y. M., DM; Pavlovska K. M., DM; Potapchuk O. V., DM, Cherniavskiy V. H., DM., Shukhtina I.M. DM.<br><b>Assistants:</b> Alavatska T. V., Maistrenko M.S., Kravtsova K. V., Riabinina A. H., Romanchenko M.I., Uhan V.V., Bondarenko O.V., Zolotaryova K.O., Panin V.N., Yurdanova I.I. |
| <b>Contact Number</b>                              | Help by phone:<br>Savelyeva Olga Valeriivna, head teacher of the department +380 95 279 28 52<br>Belozertseva-Baranova Yuliya Evgeniyvna, senior laboratory technician of the department +380668510435<br>E-mail <a href="mailto:ynutrimed1@onmedu.edu.ua">ynutrimed1@onmedu.edu.ua</a><br>Face-to-face consultations: from 14:40 to 16:00 every day.<br>Online consultations: from 14.40 p.m. to 16:00 p.m. every day.<br>A link to online counseling is provided to each group during classes separately.                                                                            |

## COMMUNICATION

Communication with applicants will take place in the classroom (face-to-face).

During distance learning, communication develops through the Microsoft Teams platform, as well as through e-mail correspondence, Viber messengers (through groups created in Viber for each group, separately through the old group).

## THE COURSE ANNOTATION

*The subject of the study of the discipline* is the mastery by students of higher education of the methods and techniques of clinical examination of a patient with cardiac pathology, the peculiarities of professional communication between a doctor and a patient, subjective and objective manifestations of diseases (symptoms and syndromes) with the establishment of a diagnosis, treatment tactics of preventive measures in an inpatient setting. at the stage of treatment of a patient with diseases of the cardiovascular system (CVD).

*Prerequisites and post-requisites of the discipline (place of the discipline in the educational program):*

*Prerequisites:* Ukrainian language (for professional fields), foreign language (for professional fields), Latin language and medical terminology, medical biology, medical and biological physics, biological and bioorganic chemistry, human anatomy, histology, cytology and embryology, physiology, microbiology, virology and immunology, life safety; basics of bioethics and biosafety, pathomorphology, pathophysiology, pharmacology, propaedeutics of therapy, medical psychology.

*Postrequisites:* internal medicine, surgery, obstetrics and gynecology, infectious diseases, epidemiology and principles of evidence-based medicine, oncology and radiation medicine, traumatology and orthopedics, phthisiology, anesthesiology and intensive care, emergency and emergency medical care, hygiene and ecology, palliative and hospital medicine, general practice (family medicine).

*Meta disciplines:* to prepare a candidate who is able to master professional competences and skills, to observe and manage a patient with endocrine pathology according to the specified lists of symptoms, syndromes and inappropriate conditions that require special tactics of managing places, laboratory and instrumental studies, medical manipulations for solving tasks and problems in the field of medicine, health care and further education.

*Tasks of the discipline:*

- formation of communication skills and clinical examination of patients with the main diseases of the cardiovascular system and analyze their results;
- formation of skills for determining etiological and pathogenetic factors of the most advanced diseases of the cardiovascular system;
- Formation of skills and abilities to establish a preliminary diagnosis of the most advanced diseases of the cardiovascular system.
- Formation of abilities and skills of drawing up a plan for laboratory and instrumental research of patients with the most common diseases of the cardiovascular system.
- Improving of abilities and skills of substantiation of clinical diagnosis, differential diagnosis of the most advanced diseases of the cardiovascular system.
- Mastering the ability to determine the tactics of emergency care, management, treatment and prevention of the most advanced diseases of the cardiovascular system.

*Expected results:*

*As a result of studying the academic discipline, the applicant must:*

*Know:* the basic principles of diagnosis and treatment of diseases of the cardiovascular system, which are based on the principles of evidence-based medicine.

*Be able:*

- Communicate with the patient and his relatives, perform a clinical examination of a patient with diseases of the cardiovascular system, namely, collect data on the patient's complaints, medical history, life history.
- To evaluate information about the diagnosis based on the results of laboratory and instrumental studies, namely, to determine the list of necessary clinical and laboratory and instrumental studies and to evaluate their results.
- Identify the leading clinical symptom or syndrome. Establish the most likely or syndromic diagnosis of the disease. Assign laboratory and instrumental examination of the patient.
- Carry out differential diagnosis of the disease. Establish a preliminary and clinical diagnosis.
- To determine the nature and principles of treatment of patients 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.
- Diagnose emergency conditions.
- Determine tactics and provide emergency medical assistance.
- Perform medical manipulations. (according to list 5).
- Keep medical documentation.

## DESCRIPTION OF THE EDUCATIONAL DISCIPLINE

### *Forms and methods of education*

The discipline will be taught in the form of practical classes (30 classroom hours); organization of the applicant's independent work (60 hours).

*Teaching methods:* conversation, role-playing, solving clinical situational problems, patient examination, manipulations according to list 5, instruction and practice of skills on dummies, training exercises on differential diagnosis of the most common diseases of the cardiovascular system.

### *Content of the academic discipline*

*Topic 1:* Management of a patient with arterial hypertension. Hypertensive crises, peculiarities of treatment tactics

*Topic 2:* Management of a patient with cardiac pain

*Topic 3:* Management of a patient with acute coronary syndrome. Management of a patient with shortness of breath.

*Topic 4:* Management of a patient with heart murmurs. Management of a patient with cardiomegaly. Management of a patient with heart failure

*Topic 5:* Management of a patient with a heart rhythm disorder. Management of a patient with impaired cardiac conduction.

### *List of recommended literature:*

#### *Main:*

1. L. Brent Mitchell, MD, Libin Cardiovascular Institute of Alberta, University of Calgary Last full review/revision Jan 2021| Content last modified Sep 2022
2. Harrison's "Principles of internal medicine", 19th edition, 2022.
3. Davidson's "Principles of Practice of Medicine" 23rd edition, 2022
4. The ECG Made Practical, John R. Hampton 7th edition 2023
5. Harrison's Principles of Internal Medicine, Twentieth Edition (Vol.1 & Vol.2) 20th Edition, McGraw-Hill Education / Medical; 20th edition (August 13, 2020), 4048 pages
6. John R. Hampton. The ECG in Practice. With contributions by David Adlam. 6th edition. 2020.

#### *Additional:*

1. Ranya N. Sweis , MD, MS, Northwestern University Feinberg School of Medicine; Arif Jivan , MD, PhD, Northwestern University Feinberg School of Medicine. Last full review/revision Jun 2022| Content last modified Sep 2022

### *Electronic information resources*

1. <https://www.cardiology.org/>
2. <https://cardiology.org/tools/>
3. <https://www.ama-assn.org/>
4. <https://jamanetwork.com/>
5. <https://www.escardio.org/> - Congress-Home-2024

## EVALUATION

*Forms and methods of current control:* oral (survey), practical (working with a patient), assessment of communication skills and activity in class and during role play, assessment of interpretation of clinical, laboratory and instrumental research results.

### Criteria of ongoing assessment at the practical class

| Score     | The structure of evaluation of the current educational activity of one seminar session |
|-----------|----------------------------------------------------------------------------------------|
| Excellent | The student freely uses the material, supports active participation in the role play,  |

|                       |                                                                                                                                                                                                                                                                                                                                         |
|-----------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| «5»                   | confidently demonstrates practical skills during the examination of the patient and the interpretation of clinical, laboratory and instrumental research data, expresses his opinion on the subject of the lesson, demonstrates clinical thinking.                                                                                      |
| Good<br>«4»           | The student of good material, thanks to participation in the role-playing game, demonstrates practical skills during the examination of the patient and the interpretation of clinical, laboratory and instrumental research data with some errors, expresses his opinion on the subject of the lesson, demonstrates clinical thinking. |
| Satisfactory<br>«3»   | The student does not have sufficient knowledge of the material, he is unsure of how to participate in the role play, he demonstrates practical skills during the examination of the patient and the interpretation of clinical, laboratory and instrumental research data with significant errors.                                      |
| Unsatisfactory<br>«2» | The student does not possess the material, does not take part in the role-play, does not demonstrate practical skills during the examination of the patient and the interpretation of clinical, laboratory and instrumental research data.                                                                                              |

*Forms and methods of final control:* credit test, issued to the applicant who has completed all sections of the educational program of the selected discipline, actively participated in practical classes, has an average current grade of at least 3.0 and has no academic debt.

*Possibility and conditions of obtaining additional (bonus) points:* not provided.

### **Independent work of students of higher education**

Independent work of preparation for each seminar class.

#### **Policy of educational discipline**

##### **Deadline and rescheduling policy:**

- Missing classes for unimportant reasons will be made up according to the schedule of the teacher on duty.
- Absences for valid reasons are worked out according to an individual schedule with the permission of the dean's office.

##### **Academic Integrity Policy:**

Applicants must observe academic integrity, namely:

- independent performance of all types of work, tasks, forms of control provided for by the work program of this educational discipline;
- references to sources of information in the case of using ideas, developments, statements, information;
- compliance with the legislation on copyright and related rights;
- provision of reliable information about the results of one's own educational (scientific) activity, used research methods and sources of information.

Unacceptable in educational activities for participants of the educational process are:

- using family or official ties to obtain a positive or higher grade during any form of control of learning outcomes or academic performance;
- use of prohibited auxiliary materials or technical means (cheat sheets, notes, micro-earphones, telephones, smartphones, tablets, etc.) during control measures;
- passing procedures for control of training results by fake persons.

For violation of academic integrity, students may be held to the following academic responsibility:

- decrease in the results of evaluation of control work, evaluations on employment, credits, etc.;
- retaking the assessment (test, final exam, etc.);
- appointment of additional control measures (additional individual tasks, control works, tests, etc.);
- conducting an additional inspection of other works authored by the violator.

##### **Attendance and Tardiness Policy:**

Uniform: a medical gown that completely covers the outer clothing, or medical form, a cap, a mask,

and a change of shoes.

Equipment: notebook, pen, phonendoscope.

State of health: people with acute infectious diseases, including respiratory diseases, are not allowed to attend classes.

A student who is late for class can attend it, but if the teacher has put "ab" in the journal, he must complete it in the general order.

*Use of mobile devices:*

Mobile devices may be used by students with the permission of the instructor if they are needed for the assignment.

*Audience behavior*

The behavior of student and teachers in the classrooms should be working and calm, strictly comply with the rules established by the Regulations on academic integrity and ethics of academic relations at Odessa National Medical University, in accordance with the Code of Academic Ethics and University Community Relations of Odessa National Medical University, Regulations on Prevention and detection of academic plagiarism in the research and educational work of students of higher education, scientists and teachers of Odessa National Medical University.