

MINISTRY OF SCIENCE AND HIGHER EDUCATION OF THE RUSSIAN FEDERATION
MINISTRY OF EDUCATION AND SCIENCE OF THE KYRGYZ REPUBLIC

Government-run Educational Institution of Higher professional education
Kyrgyz-Russian Slavic University after B.N. Yeltsin



ENDORSED by
Professor Anes Zarifyan

COVID-19 patient care

Course Outline (Module)

Assigned to **Department of Infectious diseases**
Academic curriculum 31050151_18_3456LD ин.plx
Specialty 31.05.01. - RF, 560001 - KG General medicine
(for foreign students)

Mode of study **Intramural**
Total credit value **1 credit points**

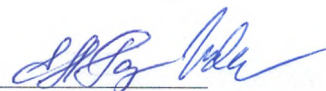
Course hours 36
including:
in-class learning 18
individual work 17,8
Scope of testing semesters:
credits 10

Course hours scheduling (per semester)

Semester Academic Year	10 (5.2)		Total	
	Weeks			
Type of training	AC	CO	AC	CO
Lectures	12	12	12	12
Practical session	6	6	6	6
Contact work	0,2	0,2	0,2	0,2
Total in-class session	18	18	18	18
Contact work	18,2	18,2	18,2	18,2
Student's individual work	17,8	17,8	17,8	17,8
Total	36	36	36	36

The course outline was compiled by:

PhD, associate professor Kuvatova D.O.; PhD, head of department Radchenko E.A.



Reviewers:

PhD, head of department Dzhumaguliva A.Sh.; MD., Ph.D., head of department Dzholbunova Z.K.



The course outline

COVID-19 patient care

Developed in full compliance with FSES 3+:

Federal state educational standard of higher professional education for students trained for the specialty 31.05.01 (the Ministry of Education and Science of the Russian Federation Order of "09" 02 2016 No.95)

in accordance with Academic curriculum:

Specialty 31.05.01. - RF, 560001 - KG General medicine
(for foreign students)

confirmed by KRSU Board of Academics in 28 June 2022 record №11.

The course outline endorsed by Infectious diseases department meeting

Record of 29.09.2022 r. № 1

Valid for: 2022-2026 academic year

The Head of department: PhD, associate professor Radchenko E.A.



The course outline endorsed for the following academic year

Chairman of the educational and methodological board

06 10 2022. *U. Radchenko*

The course outline has been revised, considered and endorsed for implementation in 2022-2023 academic year at the staff meeting

of Infectious diseases department

Record of 12/09 2022. № 2
The Head of department PhD, associate professor Radchenko E.A. *ER*

The course outline endorsed for the following academic year

Chairman of the educational and methodological board

_____ 2023.

The course outline has been revised, considered and endorsed for implementation in 2023-2024 academic year at the staff meeting

of Infectious diseases department

Record of _____. № ____
The Head of department PhD, associate professor Radchenko E.A.

The course outline endorsed for the following academic year

Chairman of the educational and methodological board

_____ 2024.

The course outline has been revised, considered and endorsed for implementation in 2024-2025 academic year at the staff meeting

of Infectious diseases department

Record of _____. № ____
The Head of department PhD, associate professor Radchenko E.A.

The course outline endorsed for the following academic year

Chairman of the educational and methodological board

_____ 2025.

The course outline has been revised, considered and endorsed for implementation in 2025-2026 academic year at the staff meeting

of Infectious diseases department

Record of _____. № ____
The Head of department PhD, associate professor Radchenko E.A.

1. COURSE OUTLINE OBJECTIVES

1.1	Formation of knowledge of skills and practical skills necessary for the early diagnosis of a new coronavirus infection, the implementation of a complex of therapeutic and preventive measures, the diagnosis of emergency conditions at the pre-hospital stages of medical care.
-----	---

2. PLACE OF THE COURSE IN THE EDUCATIONAL PROGRAM

Educational Program Units:		Optional discipline
2.1	Student's preliminary training requirements:	
2.1.1	Infectious diseases	
2.2	Course units and practical sessions imposing the prior Proficiency:	
2.2.1	Family medicine	

3. STUDENT'S COMPETENCIES RESULTING FROM THE COURSE UNIT (MODULE)

GPC-10: readiness to ensure the organization of care for the sick and the provision of primary health care

Knowledge:

Level 1	Basic rules for the organization of patient care and the provision of primary pre-medical health care.
Level 2	The specifics of the main methods of organizing patient care and providing primary pre-medical health care
Level 3	The main methods of organizing patient care and providing primary pre-hospital health care.

Skills:

Level 1	To reveal the meaning of the organization of patient care and the provision of primary pre-hospital health care.
Level 2	To compare different methods of organizing patient care and providing primary pre-hospital health care.
Level 3	To note the practical value of specific methods of organizing patient care and providing primary pre-medical health care.

Expertise:

Level 1	Preparedness skills to ensure the organization of patient care and the provision of primary pre-hospital health care.
Level 2	Search techniques and identification of the main methods of organizing patient care and providing primary pre-medical health care
Level 3	Skills for assessing, differentiating the main methods of organizing patient care and providing primary pre-medical health care.

GPC-11: readiness for the use of medical devices provided for by the procedures for the provision of medical care

Knowledge:

Level 1	Medical devices provided by the procedures for the provision of medical care.
Level 2	Comparative characteristics of medical devices provided for by the procedures for providing medical care to patients
Level 3	The use of medical devices provided for by the procedures for providing medical care to patients.

Skills:

Level 1	Determine the scope of medical devices provided for by the procedures for the provision of medical care.
Level 2	Conduct a comparative analysis of medical devices.
Level 3	Apply medical devices provided for by the procedures for providing medical care to patients

Expertise:

Level 1	The skills to identify medical devices, their scope and the algorithm for using them to provide medical care.
Level 2	Comparative characteristics of medical devices and use in standard cases
Level 3	Skills in the use of medical devices provided for by the procedures for providing medical care to patients

PC-9: readiness for the management and treatment of patients with various nosological forms in outpatient and day-care hospital levels

Knowledge:

Level 1	The structure of the infectious service, the principles of organization, the organization of the work of infectious diseases hospitals, departments, wards;
Level 2	The main aspects of the pathogenesis of infectious diseases; The main clinical manifestations (symptoms, syndromes) of the studied infectious diseases;
Level 3	Basic principles of treatment of infectious diseases;

Skills:

Level 1	Assess the severity of the course of an infectious disease; Predict the course and outcome of an infectious disease;
Level 2	Diagnose emergency conditions in a child with an infectious pathology, as well as determine further medical tactics in threatening conditions;
Level 3	Formulate a diagnosis in accordance with the requirements of ICD-10.
Expertise:	
Level 1	Skills in providing a complex of therapeutic and preventive measures at the pre-hospital and hospital stages;
Level 2	Skills in providing emergency (urgent) and first medical aid in case of infectious pathology;
Level 3	Methods for examining a child with an infectious pathology (examination, palpation, percussion, auscultation);
PC-13: readiness to participate in the provision of medical care in emergency situations, including participation in medical evacuation	
Knowledge:	
Level 1	Fundamentals of medical and evacuation measures in emergency situations.
Level 2	Types of emergency situations (ES) in peacetime - man-made, biological, social, their traumatic factors and types of possible injuries in people as a result of these emergency situations (ES)
Level 3	Preparation of healthcare facilities for work in emergency situations (ES) of peacetime and wartime. Peculiarities of work of healthcare facilities in emergency situations of peacetime and wartime.
Skills:	
Level 1	Perform medical triage
Level 2	To characterize the medical and tactical situation of various types of emergency situations (ES)
Level 3	Provide first aid to victims in emergency situations (ES)
Expertise:	
Level 1	Techniques for providing first aid to the injured, sick, wounded in emergency situations of war and peacetime
Level 2	The main technical means of cardiopulmonary resuscitation, personal and medical protective equipment
Level 3	Techniques for providing first aid to victims in the foci of emergency situations.

Final student's competences:

3.1	Knowledge:
3.1.1	The structure of the infectious service, the principles of organization, the organization of the work of infectious diseases hospitals, departments, wards;
3.1.2	Main aspects of the pathogenesis of COVID-19;
3.1.3	Main clinical manifestations (symptoms, syndromes) of COVID-19;
3.1.4	The main methods of laboratory and instrumental diagnostics used in infectology (indications for use, theoretical foundations of the method, interpretation of the results);
3.1.5	Basic principles for the treatment of COVID-19;
3.1.6	Indications for hospitalization for COVID-19;
3.1.7	Specific and non-specific prevention of COVID-19.
3.2	Skills:
3.2.1	Collect a medical and life history (including an epidemiological history) from an infectious patient;
3.2.2	Draw up a diagnostic search algorithm, a plan for laboratory and instrumental examination;
3.2.3	Interpret the results of laboratory and instrumental examination of the patient;
3.2.4	Identify leading clinical and laboratory syndromes;
3.2.5	Conduct a differential diagnosis between various diseases with similar clinical symptoms;
3.2.6	Assess the severity of COVID-19 infection;
3.2.7	Predict the course and outcome of COVID-19;
3.2.8	Diagnose emergency conditions in patients with COVID-19, as well as determine further medical tactics in threatening conditions;
3.2.9	Formulate a diagnosis in accordance with the requirements of ICD-10.
3.3	Expertise:
3.3.1	Methods for examining a patient with COVID-19 (examination, palpation, percussion, auscultation);
3.3.2	In differential diagnosis of symptoms and syndromes specific to COVID-19;
3.3.3	In providing a complex of therapeutic and preventive measures at the pre-hospital and hospital stages;
3.3.4	In providing emergency (emergency) and first aid for COVID-19;

4. COURSE (MODULE) STRUCTURE AND CONTENT								
Class code	Subject name /type of class/	Semester / Academic year	Hours	Competencies	Literature	Interactive session	practice	Notes
	Section 1.							
1.1	History, etiology and epidemiology of COVID-19 /Lec/	10	2	GPC-10 GPC-11 PC -9 PC-13	e1			
1.2	Pathogenesis and clinical manifestations of COVID-19 /Lec/	10	2	GPC-10 GPC-11 PC -9 PC-13	e1			
1.3	Diagnosis of COVID-19 infection and outpatient care /Lec/	10	2	GPC-10 GPC-11 PC -9 PC-13	e1			
1.4	Treatment of COVID-19 infection in a hospital setting /Lec/	10	2	GPC-10 GPC-11 PC -9 PC-13	e1			
1.5	Treatment of COVID-19 infection in children, adults with cardiovascular disease, diabetes mellitus and COPD /Lec/	10	2	GPC-10 GPC-11 PC -9 PC-13	e1			
1.6	Specific and non-specific prevention of COVID-19 infection /Lec/	10	2	GPC-10 GPC-11 PC -9 PC-13	e1			
1.7	Skills for examining a patient and choosing a roadmap for COVID-19 /Prac/	10	2	GPC-10 GPC-11 PC -9 PC-13	e1			
1.8	Skills in using personal protective equipment for COVID-19 infection /Prac/	10	2	GPC-10 GPC-11 PC -9 PC-13	e1			
1.9	Treatment of outpatients with COVID-19 infection /Prac/	10	2	GPC-10 GPC-11 PC -9 PC-13	e1			
1.10	Differential diagnosis of COVID-19 /SIW/	10	6	GPC-10 GPC-11 PC -9 PC-13	e1			
1.11	Rehabilitation of patients with COVID-19 and post-COVID syndrome /SIW/	10	6	GPC-10 GPC-11 PC -9 PC-13	e1			
1.12	Palliative care for patients during the COVID-19 pandemic /SIW/	10	5,8	GPC-10 GPC-11 PC -9 PC-13	e1			
1.13	/control/credit/	10	0,2	GPC-10 GPC-11 PC -9 PC-13	e1			

5. ASSESSMENT FUND

5.1. Advancement questions and assignments

Definition, epidemiology, etiology and pathophysiology of COVID-19
 Diagnosis of COVID-19
 Severity assessment of COVID-19
 Treatment for COVID-19
 Outpatient management and treatment of COVID-19

<p>Management and treatment of extremely severe COVID-19 in adults (ARDS, sepsis, septic shock)</p> <p>Management and treatment of extremely severe COVID-19 in children (ARDS, sepsis, septic shock, multisystem inflammatory syndrome)</p> <p>Diagnosis, management and treatment of COVID-19 patients with acute complications</p> <p>Management and treatment of patients with diabetes mellitus and endocrinopathies in COVID-19</p> <p>Management and treatment of patients with cardiovascular disease and COVID-19</p> <p>Management and treatment of COPD and asthma patients with COVID-19</p> <p>Post covid syndrome</p> <p>Clinical examination</p> <p>Rehabilitation of patients with COVID-19 and post-COVID syndrome</p> <p>Roadmap for Outpatient Patients Based on Risk Stratification and Severity of COVID-19</p> <p>Algorithm for the provision of palliative care in the context of the COVID-19 pandemic</p> <p>Evaluation and treatment of patients with post-COVID syndrome.</p>
5.2. Course papers themes
Coursework is not included in the curriculum.
5.3. Assessment Fund
MCQ's sample in the app
5.4. List of types of evaluation tools
<p>MCQs;</p> <p>Interpretation of laboratory data;</p> <p>SIW: Report with presentation;</p>

6. COURSE (MODULE) METHODOLOGICAL AND INFORMATIONAL SUPPORT

6.1. Recommended reading

6.2 Online Resources

Э1	Clinical guidelines for the diagnosis and treatment of coronavirus infection (COVID-19)	https://saksalamat.kg/
----	---	---

6.3. List of Information and Education Technologies

6.3.1 Competence-based Educational Technologies

6.3.1.1	Traditional educational technologies: lectures, practical classes focused on communicating knowledge and methods of action to students. Transferred to students in finished form and intended for assimilation. Practical classes are held on the basis of the infectious diseases hospital.
6.3.1.2	Innovative educational technologies: classes that form systemic thinking and the ability to generate ideas when solving various creative problems - role-playing games, classes in a simulation center.
6.3.1.3	Information educational technologies: independent use of Internet resources by students to perform practical tasks and independent work, familiarization with photo and video materials from Internet sources in the relevant section.

6.3.2 List of Information Reference Systems and Software

6.3.2.1	https://saksalamat.kg/
---------	---

7. COURSE (MODULE) LOGISTICS

7.1	Theoretical and practical study of the program on infectious diseases is carried out at the Department of Infectious Diseases located on the basis of the Republican Clinical Infectious Diseases Hospital, which is designed for 400 beds, has 19 departments, clinical and bacteriological laboratories, an ultrasound room, an X-ray room, a fibroelastometry room.
7.2	The department has 5 classrooms, designed for 15 seats each, a lecture hall for 120 seats, a laboratory room. All classrooms are equipped with furniture, light sources, thematic sets of tabular material.
7.3	Technical equipment: 1 computer, 1 laptop, multimedia projector, projection screen, MFP (printer, scanner, copier), Internet access, telephone, camera.
7.4	Visual aids: training stands (7), training tables (30), slides (270), photo albums (8), videos (12),
7.5	educational case histories (14).
7.6	Lecture presentations on all topics of the lecture course (Power Point -27 pcs.)
7.7	Computer classes (building 11 on L. Tolstoy street, room 4/12,4/15) with access to the Internet for performing IWS, familiarization with Internet sources, video materials.
7.8	To conduct interactive training, students are provided with access to the simulation center - the Center for Integrative and Practical Training of the KRSU, equipped with simulators, simulator mannequins, resuscitation equipment, etc.

8. COURSE (MODULE) PROFICIENCY METHODOICAL GUIDELINES (FOR STUDENT)

MODULAR CONTROL BY DISCIPLINE INCLUDES:

1. Current control: the assimilation of educational material in the classroom (lectures, practical, including attendance and activity are taken into account) and the implementation of mandatory tasks for independent work
2. Frontier control: checking the completeness of knowledge and skills on the material of the module as a whole. The implementation of modular control tasks is carried out in writing and is a mandatory component of modular control.
3. Intermediate control - a completed documented part of the academic discipline (10 semester - credit) - a set of closely related credit modules.

BASIC REQUIREMENTS FOR INTERIM CONTROL

When appearing for exams and tests, students are required to have record books with them, which they present to the examiner at the beginning of the exam or to the teacher at the test. The teacher is given the right to put a test without a survey, to those students who scored more than 60 points for the current and boundary control. At the intermediate control, the student must correctly answer the theoretical questions of the ticket - (know), correctly perform the situational task and interpret the laboratory data (be able, own).

During the intermediate control, the teacher sums up the results of the curation of the patient by students during the semester.

Intermediate control score:

- min 20 points - Questions to test the level of knowledge KNOW (if the student correctly formulates the basic concepts when answering the questions asked)
- 20-25 points - Tasks to test the level of learning TO BE ABLE and OWN (in case the student correctly formulates the essence of the problem specified in the ticket and gives recommendations for its solution)
- 25-30 points - Tasks to test the level of training TO BE ABLE and OWN (in case of complete completion of the control task)

BASIC REQUIREMENTS FOR CURRENT CONTROL.

I. When constructing a practical lesson, teachers adhere to the following general indicative plan:

1) Organizational stage of the lesson (time - up to 2%):

- a) roll call;
- b) homework for the next topic;
- c) motivation of the topic of this practical lesson;
- d) familiarization of students with the objectives and plan of the lesson;

2) Control and correction of the initial level of knowledge (time - up to 20%):

- a) test control options of I and III levels;
- b) correction by the teacher of theoretical knowledge of students;
- 3) The stage of demonstration by the teacher of practical skills and / or thematic patients (time - up to 15%);
- 4) The stage of independent work of students at the bedside of the patient (time - up to 45%);

5) The final stage of the lesson (time - up to 18%):

- a) the final final control of the formed practical skills and abilities in the analysis of patients examined by students
- b) the final final control of the formed theoretical knowledge and skills, including by solving situational clinical problems;
- c) summing up the results of the practical lesson (characterization by the teacher of the fulfillment by students of all the goals of the lesson and individual assessment of knowledge and skills).

Recommendations for working with literature.

The theoretical material of the course becomes more understandable when, in addition to listening to lectures and studying notes, books are also studied. It is easier to master the course by sticking to one textbook and notes. It is recommended, in addition to "learning" the material, to achieve a state of understanding of the subject of the discipline being studied. To this end, it is recommended that after studying the next paragraph, perform a few simple exercises on this topic. In addition, it is very useful to mentally ask yourself the following questions (and try to answer them): what is this paragraph about, what new concepts have been introduced, what is their meaning, what will this give in practice?

When preparing for intermediate and midterm controls, you need to study the theory: definitions of all concepts and approaches to assessment to the state of understanding the material and independently perform several typical tasks.

Control over the assimilation by students of the material of the curriculum of the discipline is carried out systematically by the teacher of the department and is reflected in the journal of the teacher and in points. A student who has received an unsatisfactory mark on the current material is obliged to prepare this section and answer it to the teacher on an individual basis. interviews.

Making up missed classes.

A lecture missed without good reason must be worked out by the method of oral questioning by the lecturer or preparation of an abstract based on the materials of the missed lecture within a month from the date of the absence. Other methods of working off missed lectures are also possible (survey for practical, test control, etc.).

Practicing practice.

- Each lesson missed by a student without a valid reason is worked out without fail by duty in the admissions department of the RCIB, then the theoretical part of the lesson is worked out according to the schedule of the department, agreed with the dean's office.
- For students who missed practical classes due to a long illness, working off should be carried out after the permission of the dean's

office according to an individual schedule agreed with the department.
- In exclusion

Technological map of the discipline "Care for the sick COVID-19"

Course 5, semester 10, CU-1, reporting -Credit

Section according to course outline	Control	Control method	Credit minimum (points)	Credit maximum (points)	Control schedule (week)
Section 1					
Care for the sick COVID-19	Current	Face-to-face conversation; SIW: Report with presentation; Attendance: 1 point is deducted for each missed and not completed lesson.	30	50	9
	Boundary	MCQ	10	20	
Total per semester			40	70	
Intermediate Control (credit)	MCQ; Clinical challenge; Interpretation of laboratory data.		20	30	9
Semester rating by discipline			60	100	

MCQs of CORONAVIRUS INFECTION

1. Which of the following is most accurate regarding the treatment or prevention of COVID-19?

- a) Follow preventive measures with a patient who has a confirmed or suspected disease;
- b) Interleukin inhibitors are strongly contraindicated in patients with severe infection;
- c) Alcohol-based disinfectants are completely ineffective in preventing infection;
- d) The combination of zanamivir and peramivir is recommended in elderly patients with severe infection;
- e) Long-term use of immunomodulatory drugs a month before the expected epidemic rise.

#

2. In the presence of what signs, a patient with a positive test for COVID-19 should be hospitalized?

- a) Mild infection;
- b) Pregnancy;
- c) Respiratory rate - 18 per minute;
- d) SpO₂ over 93%;
- e) Male.

#

3. Which of the following laboratory parameters has been found to be a significant risk factor for acute respiratory distress syndrome (ARDS) and death in patients with COVID-19?

- a) Decreased lactate dehydrogenase;
- b) Elevated D-dimer;
- c) Decrease in leukocytes;
- d) Increase in lymphocytes;
- e) Decreased interleukins.

#

4. Which of the following symptoms is most common with COVID-19?

- a) Sneezing;
- b) Hypotension;
- c) Diarrhea;
- d) Fever;
- e) Ageusia (loss of taste).

#

5. Choose a laboratory method to confirm the diagnosis of COVID-19?

- a) Immunofluorescent test;
- b) Polymerase chain reaction (PCR);
- c) Virus isolation in cell culture;
- d) Viral antigen detection test;
- e) Bacteriological examination of the nasopharyngeal specimen.

#

6. Which of the following most likely describes viral pneumonia (COVID-19) on a chest CT scan?

- a) Multilobar "matte glass";
- b) "matte glass" at the lung roots;
- c) Single solid nodules in the lung roots;
- d) Pleural effusion in the lower lateral parts;
- e) Formation of cavities in the apex of the lungs.

#

7. The laboratory indicator for antibiotic therapy for COVID-19 is:

- a) D-dimer > 5 mg/ L;
- b) IL-6 > 10 pg/ml.
- c) CRP > 10 mg/L
- d) Procalcitonin > 0.25 ng/ml
- e) Ferritin > 500 mcg/ L

#

8. Which laboratory test is indicative of initiation of anticoagulant therapy for COVID-19:

- a) D-dimer > 3 mg/L;
- b) IL-6 > 5 pg/ml;

- c) CRP > 6 mg/L;
- d) Procalcitonin > 0.15 ng/mL;
- e) Ferritin > 300 mcg/L.

#

9. Determine the indications for initiating steroid therapy for COVID-19:

- a) Asymptomatic infection;
- b) Mild infection;
- c) Moderate infection;
- d) Severe infection;
- e) Suspicious infection.

#

10. A 21-year-old patient addressed a student polyclinic with complaints of fever up to 37.2°C, sore throat, nasal congestion, headache, fatigue, loss of appetite, loss of smell, dry cough. Sick for a week. On examination, it was revealed: consciousness is clear, auscultatory - breathing is carried out on both sides, vesicular, no wheezing. Respiratory rate - 18 per minute, heart rate - 88 per minute, SpO₂ - 99%. The abdomen is soft, painless on palpation. Epidemiological history: in the family, the father and sister are on inpatient treatment in the infectious diseases hospital. Which of the following diagnoses is most likely and assess the severity of the patient's condition?

- a) Moderate adenovirus infection;
- b) Mild form of enterovirus infection;
- c) Mild coronavirus infection;
- d) Moderate coronavirus infection;
- e) Severe coronavirus infection.

#

11. A warning sign for a severe course, the so-called "Red flags" for COVID-19 in adults, includes:

- a) Anosmia;
- b) Ageusia;
- c) Sore throat;
- d) Disturbances of consciousness;
- e) Rhinorrhea.

#

12. A warning sign, the so-called "Red flags", of severe COVID-19 in children is:

- a) Loose stool;
- b) Decreased appetite;
- c) Seizures;
- d) Dry cough;
- e) Subfebrile fever.

#

13. On the 5th day of illness, a 52-year-old patient came to the polyclinic with complaints of fever up to 38.0°C, loss of smell, lack of a sense of taste of food, weakness, loss of appetite, headache and loose stools up to 4-5 times a day, without admixture of mucus and blood in the last two days. Physical findings - clear consciousness, asthenic physique, heart tones are clear, rhythmic, auscultatory - breathing is carried out on both sides, vesicular, no wheezing. Respiratory rate - 16 per minute, heart rate - 78 per minute, SpO₂ - 98%. The abdomen is soft, painless on palpation. Epidemiological history: 10 days ago, the patient was visiting for an anniversary. Which of the following diagnoses is the most likely and where should the patient be treated according to the severity of the condition?

- a) Mild COVID-19, outpatient;
- b) Moderately severe COVID-19, in hospital;
- c) Severe COVID-19, in ICU;
- d) Extremely severe COVID-19, in the ICU;
- e) Post covid syndrome, rehabilitation center.

#

14. An ambulance was called to a 65-year-old patient. The patient complains of fever up to 38.8°C, weakness, loss of appetite, dry mouth, thirst, headache, constant nausea, loose, watery stools up to 5 times a day, dry cough, body aches, loss of smell, profuse sweating. Sick for a week. The examination revealed: clear consciousness, overweight, muffled, rhythmic heart tones, with auscultation of the lungs, breathing is carried out on both sides, hard, no wheezing. Respiratory rate - 22 per minute, heart rate - 104 per minute, SpO₂ - 94%. The abdomen is soft, painless on palpation. Epidemiological history: in the team, several employees fell ill with a similar disease. From the anamnesis of life: suffers from type 2 diabetes mellitus. Which of the following diagnoses is most likely and

assess where the patient should be treated according to the severity of the condition?

- a) Mild COVID-19, outpatient;
- b) Moderately severe COVID-19, in hospital;
- c) Severe COVID-19, in ICU;
- d) Extremely severe COVID-19, in the ICU;
- e) Post-covid syndrome, rehabilitation center.

#

15. Choose at what blood oxygen saturation levels, it is necessary to start oxygen therapy for patients with COVID-19?

- a) <91%;
- b) <93%;
- c) <90%;
- d) <95%;
- e) <85%.

#

16. Find the mistake. The criteria for the effectiveness of therapy with LMWH drugs are:

- a) Prolongation of blood clotting time by 1.5-1.8 times;
- b) Elongation of the ABC test up to 140-160 s;
- c) Increase in D-dimer more than 5 mg/L;
- d) Prolongation of APTT by 1.5-2.5 times;
- e) Normalization of thrombin time.

#

17. Find the mistake. The clinical criterion for ARF is:

- a) Shortness of breath;
- b) Dyspnea;
- c) Bradycardia;
- d) Cyanosis;
- e) Delirium.

#

18. Highlight blood glucose levels during the day in critically ill patients with diabetes and COVID-19:

- a) > 3 mmol/L;
- b) 7.8 - 11.9 mmol/L;
- c) <7 mmol/L;
- d) 6-10 mmol/L;
- e) 3.3-5.5 mmol/L.

#

19. Find the mistake. The prognostic factors for the development of severe COVID-19 are:

- a) Calculous cholecystitis;
- b) HIV infection;
- c) Cardiovascular disease;
- d) Chronic kidney disease;
- e) Arterial hypertension.

#

20. When are glucocorticosteroids given to patients with COVID-19?

- a) in severe COVID-19 at SpO₂ - 93%;
- b) in severe COVID-19 at SpO₂ - 88%;
- c) all hospitalized patients;
- d) in case of a positive PCR test;
- e) should not be given to patients with COVID-19.

#

21. Choose a dose of dexamethasone to treat patients with severe COVID-19?

- a) 6 mg per day;
- b) 8 mg per day;
- c) 12 mg per day;
- d) 16 mg per day;
- e) pulse therapy with dexamethasone.

#

22. Select the duration of dexamethasone therapy in patients with COVID-19?

- a) 10 days;
- b) 14 days;

- c) 16 days;
- d) 28 days;
- e) 40 days.

#

23. Calculate the intermediate dose of LMWH for a patient with bilateral pneumonia, with D-dimer values of 10 mg/l, with a body weight of 85 kg:

- a) 0.2 every 12 hours;
- b) 0.3 every 12 hours;
- c) 0.4 every 12 hours;
- d) 0.6 every 12 hours;
- e) 0.8 every 12 hours.

#

24. Post-covid syndrome is set in on the terms of the disease COVID-19 ...

- a) ≥ 2 weeks;
- b) ≥ 4 weeks;
- c) ≥ 12 weeks;
- d) ≥ 6 months;
- e) ≥ 12 months.

#

25. Find the mistake. The most common symptom of post-COVID syndrome is:

- a) Dyspnea;
- b) Fever;
- c) chest pain;
- d) Psychological disorders;
- e) Change in taste and smell.

#

26. A 69-year-old patient weighing 80 kg was hospitalized to the infectious diseases hospital with symptoms of COVID-19 and a concomitant diagnosis of deep vein thrombophlebitis of the lower extremities. Calculate the dose of LMWH

- a) 0.4 every 12 hours subcutaneously;
- b) 0.6 every 12 hours subcutaneously;
- c) 0.8 every 12 hours subcutaneously;
- d) 1.0 every 12 hours subcutaneously;
- e) 1.2 every 12 hours subcutaneously.

#

27. Which of the anticoagulant is recommended on an outpatient basis?

- a) Heparin;
- b) Enoxaparin;
- c) Dalteparin;
- d) Rivaroxaban;
- e) Nadroparin.

#

28. The following anticoagulant can be given to a COVID-19 patient with proximal deep vein thrombosis on an outpatient basis. Where is the mistake?

- a) Apixaban;
- b) Dabigatran;
- c) Dalteparin;
- d) Rivaroxaban;
- e) Edoxaban.

#

29. Determine at what number of points on the NEWS scale for COVID-19 patients are transferred to the intensive care unit?

- a) 0 points;
- b) 1-2 points;
- c) 3-4 points;
- d) 5-6 points;
- e) ≥ 7 points.

#

30. Define the principles of care for a patient with mild COVID-19 at the outpatient level:

- a) Symptomatic therapy;
- b) Antibacterial therapy;
- c) Corticosteroid therapy;
- d) Oxygen therapy;
- e) Anticoagulant therapy.

#