Thematic plan of laboratory works on normal physiology
for students studying in English medium (second set)
for the students of the groups 201a*-205a* (IV semester 2026-2027 year)

№	Name of subjects, content	Number of hours
	PHYSIOLOGY OF BLOOD	
1.	FUNCTIONS OF BLOOD. COMPOSITION AND VOLUME OF BLOOD. 1.1. Finger prink blood sampling method 1.2. Fresh blood sample under the microscope	**4,5** **01.09.26** **04.09.26**
2.	2. PHYSICAL AND CHEMICL PROPERTIES OF BLOOD. PHYSIOLOGY OF ERYTHROCYTES. 2.1. Measurement of hematocrit number 2.2. Measurement of erythrocytes amount	**4,5** **07.09.26** **11.09.26**
3.	3. PHYSIOLOGY OF LEUCOCYTES AND THROMBOCYTES. BLOOD COAGULATION SYSTEM 3.1. Measurement of hemoglobin amount in blood by Sali method 3.2. Calculation of erythrocyte indices 3.3. Examination of morphology of leukocytes 3.4. Measurement of blood coagulation time by Althousen	**4,5** **14.09.26** **18.09.26**
4.	4. ESR. BLOOD GROUPS. REGULATION OF THE BLOOD SYSTEM. 4.1. Blood groups determination 4.2. Determination of rhesus-factor (Rh) of blood 4. 3. Measurement of erythrocyte sedimentation rate (ESR) by T.P. Panchenkov 4.4. Examination of various kinds of hemolysis 4.5. Examination of osmotic resistance of erythrocytes	**4,5** **21.09.26** **25.09.26**
5.	CONTROL CLASS ON THE TOPIC «PHYSIOLOGY OF BLOOD SYSTEM»	**4,5** **28.09.26** **02.10.26**
	PHYSIOLOGY OF EXCITABLE TISSUES	
6.	6. MEMBRANE RESTING POTENTIAL. ACTION POTENTIAL 6.1. Dynamometry. Measuring of muscle strength.	**4,5** **05.10.26** **09.10.26**
7.	7. PHYSIOLOGICAL FEATURES OF SKELETAL AND SMOOTH MUSCLES 7.1. PWC measurement by step-test method 7.2. Veloergometry. Measurement of physical working capacity by PWC170 test	**4,5** **12.10.26** **16.10.26**
	PHYSIOLOGY OF THE CENTRAL NERVOUS SYSTEM	
8.	8. GENERAL PHYSIOLOGY OF THE CENTRAL NERVOUS SYSTEM PHYSIOLOGY OF THE SPINAL CORD. 8.1. Examination of reflex reactions of the person	**4,5** **19.10.26** **23.10.26**
9.	9. PARTICULAR PHYSIOLOGY OF THE CENTRAL NERVOUS SYSTEM. PHYSIOLOGY OF THE BRAINSTEM AND DIENCEPHALON 9.1. Investigation of period of simple sensomotor reactions 9.2. Examination of the state of cerebellum functions	**4,5** **26.10.26** **30.10.26**
10	10. REFLEX ACTIVITY OF AUTONOMIC NERVOUS SYSTEM.	**4,5**

	10.1. Evaluation of the state and the reactivity vegetative nervous system by method of cardiointervalography 10.2. Evaluation of vegetative tonus by Kerdo index	**02.11.26** **06.11.26**
11.	CONTROL CLASS ON TOPICS «PHYSIOLOGY OF EXCITABLE TISSUES», «GENERAL AND PARTICULAR PHYSIOLOGY OF CNS»	**4,5** **09.11.26** **13.11.26**
	ENDOCRINE SYSTEM	
12.	12. ENDOCRINE SYSTEM, PHYSIOLOGICAL ROLE AND REGULATION OF HORMONE FORMATION. HORMONAL REGULATION OF PHYSIOLOGICAL FUNCTIONS 12.1. Evaluation of human height 12.2. Identification of persons with high risk of diabetes mellitus by questionnaire method 12.3. Analysis of conception scale at menstrual cycles f various duration	**4,5** **16.11.26** **20.11.26**
	PHYSIOLOGY OF RESPIRATION	
13.	13. MECHANISM OF RESPIRATORY MOVEMENTS. PULMONARY VOLUMES AND CAPACITIES. 13.1. Spirometry. 14. GAS EXCHANGE IN THE LUNGS. GAS TRANSPORT BY BLOOD 14.1. Spirography. 14.2. Pulse oximetry.	**4,5** **23.11.26** **27.11.26**
14.	15. REGULATION OF RESPIRATION. 17. FUNCTIONAL METHODS OF EXAMINATION OF RESPIRATORY SYSTEM 15.1. Functional test with breath-holding (Genche's and Stange's tests) 17.1. Evaluation of functional state of respiratory system and cardiovascular system by Skibinskaya's index 17.2. Evaluation of physical endurance in person by calculation of cardiorespiratory index	**4,5** **30.12.26** **04.12.26**
15.	CONTROL CLASS ON TOPICS «PHYSIOLOGY OF ENDOCRINE SYSTEM», «PHYSIOLOGY OF RESPIRATION»	**4,5** **07.12.26** **11.12.26**
16.	ATTESTATION OF STUDENTS IN LEARNING OF BASIC CLINICAL AND PHYSIOLOGICAL TECHNIQUES 1. Assessment of knowledge of basic constants in normal physiology. 2. Pre-examination computer testing. 3. Attestation of students in mastering of basic practical skills	**4,5** **14.12.26** **18.12.26**
17.	**Control class**	**4,5** **21.12.26** **25.12.26**