

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		1p. of 42

SYLLABUS

Working curriculum of the discipline "Digestive and endocrine systems in pathology" Educational program 6B10115 "Medicine"

1.	General information about the discipline		
1.1	Course code: DESP 3221	1.6	Academic year: 2025-2026
1.2	Course name: Digestive and endocrine systems in pathology	1.7	Course: 3
1.3	Prerequisites: Digestive and endocrine system is normal	1.8	Semester: 5
1.4	Postrequisites: Fundamentals of Internal Medicine	1.9	Number of credits (ECTS): 5/150
1.5	Cycle: BD	1.10	Component: IC
2.	Description of the discipline		
Integrated discipline: formation of fundamental knowledge on the basics of semiotics, syndromology, physical examination methods and basic laboratory parameters, issues of etiology, pathogenesis, morphogenesis of the digestive and endocrine systems, acquisition of skills in choosing and analyzing the effectiveness of diagnostic methods and properties of medicines for the treatment of diseases, taking into account the principles of evidence-based medicine and a patient-centered approach			
3.	Summative Assessment Form		
3.1	• Testing	3.5	Coursework
3.2	Writing	3.6	Essay
3.3	Oral	3.7	Project
3.4	• Assessment of practical skills	3.8	Another
4.	Objectives of the discipline		
Formation of a holistic understanding of the pathology of the digestive and endocrine systems, based on symptoms and syndromes, as well as on methods of their study. Ensuring the achievement of final learning outcomes based on the joint study of the pathology of the digestive and endocrine systems in the propaedeutics of internal diseases with fundamental disciplines. Formation of clinical thinking skills based on knowledge of pathophysiological mechanisms of the course, pathological changes, complications and outcomes of diseases, physical and clinical laboratory methods of examination and selection of drugs in adults with the main clinical syndromes in pathology of the digestive and endocrine systems. Development of research skills through the analysis of scientific articles, analysis of experimental studies and project activities.			
5.	Final learning outcomes (LO of the discipline)		
LO 1.	Demonstrates knowledge and understanding of the basics of semiotics and syndromology, etiology, pathogenesis and morphogenesis of pathology of the digestive and endocrine systems		
LO 2.	Has knowledge of methods for interviewing adults, uses clinical thinking in collecting information when drawing up an examination plan; outlines the scope of basic and additional studies to clarify the syndrome of damage in pathology digestive and endocrine systems		
LO 3.	Uses clinical reasoning in collecting information when interpreting results morphological, laboratory and instrumental research methods patients with pathology of the digestive and endocrine systems, formulates a syndromic diagnosis, fills out a medical history		

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		2p. of 42

LO 4.	Reports information, ideas, problems and solutions to patients and their family members, knows the norms of ethics and deontology in communication with patients, their relatives and colleagues														
LO 5.	Identifies pathological processes at the organ and cellular levels, interprets data on the pathophysiology and morphology of diseases taking into account the clinical data of patients, makes conclusions, explains the patterns of development of complications and outcomes of pathology of the digestive and endocrine systems, evaluates the results of experimental studies														
LO 6.	Selects medicinal means in accordance with the diagnosis, writes prescriptions, determines the dosage regimen, recognizes adverse effects of drugs, predicts the development of side effects and interactions of drugs used in pathology of the digestive and endocrine systems														
5.1	LO discipline		Learning outcomes of the EP, which are associated with the discipline LO												
	LO 1 LO 2		LO 1 Apply fundamental knowledge in biomedical, clinical, epidemiological and social-behavioral sciences in practice.												
	LO 3 LO 4		LO 2 Provides patient-centered care in the fields of biomedical, clinical, and epidemiological sciences aimed at diagnosing, treating, and preventing the most common diseases.												
	LO 5		LO 6 Provides outpatient consultation, diagnostics, treatment, dynamic monitoring and rehabilitation of pediatric and adult patients, including pregnant women, based on the principles of evidence-based medicine.												
	LO 6		LO 11 Analyzes the effectiveness of diagnostics and treatment results using the principles of personalized medicine												
6. Detailed information about the discipline															
6.1	Venue (building, auditorium): - Location of the Department of Pathology and Forensic Medicine: Shymkent, Al-Farabi sq., 3, academic building No. 2 of SKMA, 4th floor, rooms No. 404 a, b, No. 406, No. 408, No. 409, No. 411 a, b; e-mail: Patan.gisto@mail.ru - Location of the Department of Pharmacology, Pharmacotherapy and Clinic of Pharmacology: Shymkent, Al-Farabi Ave., 1, main educational building of SKMA, 4th floor, room No. 419, No. 421, No. 425, No. 431, No. 434, No. 417, Lecture Hall No. 4. Location of the Department of Internal Medicine Propaedeutics: Shymkent, ParkHealth Clinic, Kabanbai Batyr St. 26, 2nd floor; tel.: 8 701 738 6114, e-mail: propedevtica_vb@mail.ru														
6.2	Number of hours		Lectures 10	Practical. les. 40		Lab.		SWIT 15				SIW 80			
6.3	Plan study of the discipline														
Days			1	2	3	4	5	6	7	8	9	10	11	12	Watch
Form of the lesson															
Propaedeutics of internal diseases (2 cr.)	Lecture		1			1		1			1				4
	Practical		3			1		4		2	4			2	16
	SWIT		1			1		1		1	1			1	6
								R K N						R K № 2	

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ			SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology			47 / 11 3p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)			

							o. 1						
	SIW	1			1		1			1			28+6(PA)=34
Pharmacology (1 cr.)	Lecture		1				1					2	
	Practical		3				3				2	8	
	SWIT		1				1				1	3	
	SIW		6				6				2	14+3(PA)=17	
Pathological anatomy (1 cr.)	Lecture			1				1				2	
	Practical			4				1		3		8	
	SWIT			1				1		1		3	
	SIW			6				3		5		14+3(PA)=17	
Pathological physiology (1 cr.)	Lecture				1				1			2	
	Practical				2	3			3			8	
	SWIT				1	1			1			3	
	SIW				2	6			6			14+3(PA)=17	

7.	Information about teachers		
No	Full name	Degrees and Position	Email address
Department of Pathology and Forensic Medicine			
1	Sadykova Aliya Shamilevna	Head of the Department of Pathology and Forensic Medicine, Doctor of Medical Sciences, Acting Professor	aliya.sadykova.66@mail.ru
2	Bisimbaeva Saule Babatovna	PhD, Acting Associate Professor	Bisimbaeva@inbox.ru
3	Dosybaev Bakhytzhan Krykbaevich	PhD, Acting Associate Professor	Krik85@mail.ru
4	Khodzhaev Nurlan Kenzhetoreevich	PhD, Acting Associate Professor	
5	Kulbalieva Zhannat Zhakslikovna	PhD, Acting Associate Professor	zhann_7@mail.ru
6	Kerimov Rasim Azatovich	Master, Senior Lecturer	Kir-2004@list.ru
7	Abildina Kalamkas Berzhanovna	Master, Assistant	Mskas1972@mail.ru
8	Ignatieva Anastasia Sergeevna	Senior Lecturer	Zhelonkina_88@mail.ru
9	Berdalieva Gulmira Bakhytkyzy	Senior Lecturer	Mira-3505@mail.ru
10	Kurymbaeva Ainur Rashidkyzy	Assistant	Smp_zoj@mail.ru
11	Seydakbar AysanaUsenovna	Teacher	aseydakbar@mail.ru
12	Duysembieva Zhazira Mereykyzy	Teacher	zhazira0508@mail.ru
Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology			
1	Ibragimova Aigul Gaffarovna	PhD, Acting Associate Professor	aygul_ibr@mail.ru
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3	Korganbaeva Zauze Sarybaevna	PhD, Acting Associate Professor	korganbaeva055@mail.ru
4	Syrmanova Nurgul Rakhmanovna	Master of Medical Sciences, Senior Lecturer	n_rakchman@mail.ru
5	Dustanova Zhamila Talibbaevna	Senior Lecturer	jam11.76.76@mail.ru
6	Muyutova Makhsuda Nasyrovna	Master of Medical Sciences, Senior Lecturer	mahsu_med@mail.ru
Department of Propaedeutics of Internal Diseases			
1	Bekmurzaeva Elmira Kuanyshevna	Head of the Department, Doctor of Medical Sciences, Professor	Elmira-bek@mail.ru
2	Sadykova Gulzhan Saparovna	PhD, Acting Associate Professor	gulzhan2171@mail.ru

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 4p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

3	Baydullaev Bakhram Muzaffarovich	Assistant	bbm2055@mail.ru
4	Akhaeva Laura Zhaksylykovna	Assistant	Laura1990a00@mail.ru
5	Toktarova Gulnaz Abdimalikovna	Assistant	Toktar_8585@mail.ru
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7	Rysbekova Gauhar Asankyzy	Assistant	gauharco@gmail.com
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10	Balabek Gauhar Bakytzhankyzy	Assistant	Balabek.g@mail.ru

8. Thematic plan						
Week/day	Topic Title	Summary	LO of discipline	Quantity of hours	Methods/ learning technologies	Forms/ evaluation methods
1	Propaedeutics of internal diseases. Lecture 1 Questioning, complaints, general examination of patients with pathology of the digestive and hepatobiliary system. Superficial and deep palpation of the abdomen using the Obratzsov method, percussion and palpation of the liver according to Kurlov and the pancreas, auscultation of the abdominal organs: determination of the lower border of the stomach.	Questioning, complaints, general examination of patients with pathology of the digestive and hepatobiliary system. Superficial and deep palpation of the abdomen using the Obratzsov method, percussion and palpation of the liver using Kurlov, auscultation of abdominal organs: determination of the lower border of the stomach, palpation of the pancreas. Diagnostic value.	LO2	1	Overview lecture	Blitz survey ReverseI am the connection
	Propaedeutics of internal diseases. Practical lesson 1 Complaints, questioning, general examination, superficial and deep palpation of the abdomen of patients with digestive system pathology. Diagnostic value.	Complaints typical of gastrointestinal diseases. Examination of the oral cavity. General examination and assessment of the data obtained. Examination of the abdomen and clinical characteristics. Methodology and technique for superficial and deep palpation of the	LO1 LO2 LO6	3	Discussion of the topic of the practical lesson, solving situational problems, learning and performing practical skills.	Checklist for oral questioning, assessment of practical skills.

ONTÜSTİK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 5p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

		abdomen using the Obraztsov-Strazhesko method. Method and technique for determining the lower border of the stomach. Method and technique for abdominal percussion to determine free fluid in the abdominal cavity.				
	Propaedeutics of internal diseases. SWIT/SIW 1 SIW tasks: theoretical training on the topic of the lesson.	Preparation and methodology for conducting instrumental and laboratory methods for examining patients with diseases of the digestive system.	LO1 LO2 LO6	1/ 1	Case technology (Case study)	Case Solution Checklist
2	Pharmacology.Lecture 1 Drugs that affect the function of the digestive organs.	Funds, influencing on gastrointestinal motility tract, antispasmodics, laxatives and antidiarrheal means. Antimicrobials used for eradication therapy Antisecretory agents: proton pump inhibitors H2-histamine blockers, M-cholinergic blockers. Antacid and antisecretory agents. Gastroprotectors. Synthetic analogues of prostaglandins.	LO1	1	Overview lecture	Blitz survey Reverse I am the connection
	Pharmacology.Practical lesson 1 Medicines used for inflammatory diseases of the gastrointestinal tract and dyspepsia	Agents affecting gastrointestinal motility, antispasmodics, laxatives and antidiarrheals. Antimicrobials used for eradication therapy. Antisecretory agents: proton pump inhibitors H2 histamine blockers, M-anticholinergics. Antacid and antisecretory agents. Gastroprotectors.	LO6	3	Work in small groups, discuss the topic, case study	Checklist

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 6p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

		Synthetic analogues of prostaglandins. Features of use in children.				
	PharmacologySWIT/SIW 1 SIW tasks: theoretical training on the topic of the lesson.	Medicines used for intestinal and gastric dyspepsia syndrome. Medicines used for gastric ulcer and duodenal ulcer. Indications and contraindications. Side effects. Peculiarities of use in children.	LO6	1/6	Discussion topics, presentation defense, essay, analysis of scientific articles, glossary	Checklist
3	Pathological anatomy. Lecture 1 Pathological anatomy of the gastrointestinal tract	Acute and chronic gastritis. Gastric ulcer and duodenal ulcer. Appendicitis. Peritonitis. Etiology. Pathogenesis. Morphogenesis. Pathological anatomy. Complications. Causes of death. Clinical significance.	LO1	1	Overview lecture	Blitz survey Reverse I am the connection
	Pathological anatomy. Practical lesson 1 Pathological anatomy of the gastrointestinal tract	Acute and chronic gastritis. Gastric ulcer and duodenal ulcer. Appendicitis. Peritonitis. Etiology. Pathogenesis. Morphogenesis. Pathological anatomy. Complications. Causes of death. Clinical significance.	LO3 LO5	4	Discussion of the topic, description of macro- and micropreparations with a conclusion, case-study	Checklist descriptions of macro- and micropreparations, case solution checklist
	Pathological anatomy. SWITSIW 1 SIW tasks: theoretical training on the topic of the lesson.	Diseases of the esophagus and intestines. Diverticulosis of the esophagus and intestines. Esophagitis. Esophageal tumors. Enteritis. Colitis. Crohn's disease. Benign and Malignant tumors of the intestine. Malformations of the gastrointestinal tract. Etiology. Pathogenesis. Morphogenesis.	LO3 LO5	1/6	Case study	Case solution checklist

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 7p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

		Pathological anatomy. Complications. Causes of death. Clinical significance				
4	Propaedeutics of internal diseases. Lecture 2 Leading clinical syndromes (gastric and intestinal dyspepsia) in gastroenterology. Leading clinical syndromes (jaundice and liver failure) in hepatology. Diagnostic value.	Predisposing factors and causes leading to the development of gastric and intestinal dyspepsia syndrome; jaundice syndrome and liver failure. Clinical features.	LO2	1	Overview lecture	Blitz survey ReverseI am the connecti on
	Propaedeutics of internal diseases. Practical lesson 2 Complaints, questioning, general examination, palpation and percussion of the liver according to Kurlov and pancreas of patients with pathology of the hepatobiliary system. Diagnostic value.	Complaints, questioning, general examination, palpation of the liver and pancreas of patients with hepatobiliary system pathology. Diagnostic value.	LO1 LO2 LO6	1	Discussion of the topic of practicalabout classes, solving situational problems, learning and implementing practical skills.	Checklist for oral question ing, assessme nt of practical skills.
	Propaedeutics of internal diseases. SWIT/SIW 2 SIW tasks: theoretical training on the topic of the lesson	Preparation and methodology for conducting instrumental and laboratory methods for examining patients with diseases of the hepatobiliary system.	LO1 LO2 LO6	1/1	Integrated monitoring of educational achievements using control educational cases	Checklist case solutions
	Pathological physiology. Practical lesson 1 Pathophysiology of digestion	Insufficiency of digestion, causes and pathogenetic factors. Disorders of food processing in the oral cavity and its passage through the esophagus. Digestive disorders in the stomach. Hypo- and hyperchlorhydria. Digestive disorders in the intestine. Malabsorption syndrome. Acceleration and deceleration of intestinal peristalsis.	LO3 LO5	2	Work in small groups, discuss the topic, case study	Case solution checklist

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 8p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

		Disorders of external secretion of the pancreas. Clinical significance				
	Pathological physiology SWIT/SIW 1 SLO tasks: theoretical training on the topic of the lesson	Peptic ulcer of the stomach and duodenum, etiology, pathogenesis, manifestations, complications. Clinical significance	LO3 LO5	1/2	Case study	Case solution checklist
5	Pathological physiology. Lecture 1 Pathophysiology of the liver	General etiology and pathogenesis of liver dysfunction. Liver failure, liver encephalopathy, hepatic coma, etiopathogenesis. Liver cirrhosis, etiopathogenesis, clinical and laboratory syndromes. The role of the liver in metabolic disorders. Jaundice, concept, types, Etiopathogenesis. Clinical significance	LO1	1	Overview lecture	Blitz survey Reverse I am the connection
	Pathological physiology. Practical lesson 2 Pathophysiology of the liver	General etiology and pathogenesis of liver dysfunction. Liver failure, hepatic encephalopathy, hepatic coma, etiopathogenesis. Liver cirrhosis, etiopathogenesis, clinical and laboratory syndromes. The role of the liver in liver dysfunction. metabolism. Jaundice, concept, types,	LO3 LO5	3	Work in small groups, discuss the topic, case study	Case solution checklist

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 9p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

		etiopathogenesis. Clinical significance				
	Pathological physiology. SWIT/SIW 2 SLO tasks: theoretical training on the topic of the lesson.	Gallstone disease, concept, etiology. Types of gallstones, pathogenesis of formation. Clinical meaning	LO3 LO5	1/6	Case study	Case solution checklist
6	Propaedeutics of internal diseases. Lecture 3 Questioning, complaints, general examination of patients with endocrine pathology and palpation of the thyroid gland. Methods of examining patients with endocrine pathology. Diagnostic meaning.	Questioning patients with endocrine pathology. Data from physical examination methods of the endocrine system. General examination: examination of the face, eyelids, skin; palpation of the thyroid and pancreas: methods and techniques. Predisposing factors and causes	LO2	1	Overview lecture	Blitz survey Reverse I am the connection
	Propaedeutics of internal diseases. Practical lesson 3 Leading clinical syndromes (gastric and intestinal dyspepsia) in gastroenterology. Diagnostic value.	Predisposing factors and causes leading to the development of gastric and intestinal dyspepsia syndrome. Clinical features.	LO1 LO2 LO6	4	Discussion of the topic of practical about classes, solving situational problems, learning and implementing practical skills.	Checklist for oral questioning, assessment of practical skills.
	Propaedeutics of internal diseases. SWIT/SIW 3 SLO tasks: preparation for midterm control Border control #1	Topics of lectures, practical classes, independent work, covered during 1-6 days of training.	LO1 LO2 LO6	1/1	Integrated monitoring of educational achievements with using control training cases, testing	Checklist case solutions, testing checklist
7	Pharmacology. Lecture 2 Hormonal and antihormonal agents.	Drugs used for hypothyroidism in adults. Drugs used for hyperthyroidism, their effect on metabolism. Antithyroid drugs, glucocorticosteroids. Indications and	LO1	1	Overview lecture	Checklist

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казakhstanская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 10p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

		contraindications. Side effects. Drugs used for hyperglycemia and hypoglycemia. Drugs used in hypoglycemia syndrome. Mechanism of action, Indications. Side effects.				
	Pharmacology.Practical lesson 2 Medicines used for liver diseases, for exocrine pancreatic insufficiency syndrome	Drugs used in cases of pancreatic excretory dysfunction. Substitution therapy drugs used in cases of pancreatic insufficiency. Peculiarities of use in children.	LO6	3	Work in small groups, discuss the topic, case study	Checklist
	Pharmacology.SWIT /SIW 2 SIW tasks: theoretical training on the topic of the lesson.	Classification of hormonal agents. Glucocorticoids. Glucocorticoids for systemic and local use. Drugs used in Itsenko-Cushing's disease. Mineralocorticoids. Mechanism of action. Indications and contraindications.	LO6	1/6	Discussion topics, presentation defense, essays, scientific analysis article, glossary	Checklist
8	Propaedeutics of internal diseases. Practical lesson 4 Leading clinical syndromes (jaundice and liver failure) in hepatology. Diagnostic value.	Predisposing factors and causes leading to the development of jaundice syndrome and liver failure. Clinical features.	LO1 LO2 LO6	2	Discussion of the topic of practical about classes, solving situational problems, learning and performing practical skills.	Checklist for oral examination, assessment of practical skills
	Propaedeutics of internal diseases. SWIT/SIW 4 SLO tasks theoretical training on the topic of the lesson	Laboratory research methods in patients with endocrine system diseases (determination of thyroid hormones: TSH, T3 T4, Anti-TPO; determination of pancreatic hormones).	LO1 LO2 LO6	1	Case solving	Case Solution Checklist Solution of cases specified in the content on the topic of

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Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 11p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

						the lesson
	Pathological anatomy. Lecture 2 Pathological anatomy of liver diseases	Hepatitis. Liver steatosis. Cirrhosis. Liver cancer. Pancreatitis. Pancreatic cancer glands. Acute and chronic cholecystitis. Gallstone disease. Etiology. Pathogenesis. Morphogenesis. Pathological anatomy. Complications. Causes of death. Clinical significance	LO1	1	Overview lecture	Blitz survey ReverseI am the connection
	Pathological anatomy. Practical lesson 2Pathological anatomy of liver diseases	Hepatitis. Liver steatosis. Cirrhosis. Liver cancer. Pancreatitis. Pancreatic cancer glands. Acute and chronic cholecystitis. Gallstone disease. Etiology. Pathogenesis. Morphogenesis. Pathological anatomy. Complications. Causes of death. Clinical significance	LO3 LO5	1	Discussion of the topic, description of macro- and micropreparations with a conclusion, case study	Checklist descriptions of macro- and micropreparations, case solution checklist
	Pathological anatomy. SWIT/SIW 2 SIW tasks: theoretical training on the topic of the lesson.	Malformations of the gastrointestinal tract and hepatobiliary system, types, pathological anatomy. Portal hypertension syndrome. Etiology. Pathogenesis. Morphogenesis. Pathological anatomy. Complications. Causes of death. Clinical significance	LO3 LO5	1/3	Case study	Case Solution Checklist
9	Propaedeutics of internal diseases. Lecture 4	Predisposing factors and causes leading to the development of hypo-,	LO2	1		Blitz survey ReverseI

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 12p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

	Leading clinical syndromes (hypo-, hyperthyroidism, hypo-, hyperglycemia) in endocrinology.	hyperthyroidism, hypo-, hyperglycemia. Clinical features.				am the connecti on
	Propaedeutics of internal diseases. Practical lesson 5 Questioning, complaints and general examination of patients with endocrine system pathology. Features of the patient's medical history and life. Pathological symptoms identified in patients with endocrine system disorders. Diagnostic value	Questioning, complaints and general examination of patients with endocrine system pathology. Features of the patient's medical history and life. Pathological symptoms identified in patients with endocrine system disorders. Diagnostic value. Palpation of the thyroid and pancreas (determination of the Chauffard zone, Gubergritz-Skulsky, pain points: Desjardins, Gubergritz, Mayo-Robson). Leading clinical syndromes (hypo-hyperglycemia) in endocrinology. Diagnostic value.	LO1 LO2 LO6	4	Discussion of the topic of practicalabout classes, solving situational problems, learning and performing practical skills.	Checklist for oral question ing, assessme nt of practical skills.
	Propaedeutics of internal diseases. SIW /SWIT 5 SIW tasks: theoretical training on the topic of the lesson	Analysis andinstrumental research methods in patients with endocrine system diseases.	LO1 LO2 LO6	1/1	Case technology	Case Solution Checklist Solution of cases specified in the content on the topic of the lesson
10	Pathological physiology. Lecture 2 General pathophysiology endocrine system	The main mechanisms of dysfunction of the endocrine glands. Disruption of central regulatory mechanisms. Feedback mechanism.	LO1	1	Overview lecture	Blitz survey ReverseI am the connecti on

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 13p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

		Pathological processes in the gland itself. Peripheral mechanisms of hormonal activity disturbance. Clinical significance				
	Pathological physiology. Practical lesson 3 General pathophysiology of the endocrine system	The main mechanisms of dysfunction of the endocrine glands. Disruption of central regulatory mechanisms. Feedback mechanism. Pathological processes in the gland itself. Peripheral mechanisms of hormonal activity disturbance. Clinical significance	LO3 LO5	3	Work in small groups, discuss the topic, case study	Case solution checklist
	Pathological physiology. SWIT/SIW 3 SIW tasks: theoretical training on the topic of the lesson.	Endemic goiter, concept, etiology, pathogenesis, manifestations. Clinical significance	LO3 LO5	1/6	Case study	Case solution checklist
11	Pathological anatomy. Practical lesson 3 Pathological anatomy of the endocrine system	Diabetes mellitus. Etiology. Pathogenesis. Morphogenesis. Pathological anatomy. Complications. Causes of death. Clinical significance	LO3 LO5	3	Discussion of the topic, description of macro- and micropreparations with a conclusion, case study	Checklist for description of macro- and micropreparation, checklist for solving a case
	Pathological anatomy. SWIT/SIW 3 SIW tasks: theoretical training on the topic of the lesson.	Colloid goiter. Parenchymatous goiter. Diffuse toxic goiter. Myxedema. Hoshimoto's goiter. Riddel's goiter. Thyroid cancer. Etiology. Pathogenesis. Morphogenesis. Pathological anatomy. Complications. Causes of death. Clinical significance	LO3 LO5	1/5	Case study	Case Solution Checklist
12	Propaedeutics of internal diseases.	Predisposing factors and causes leading to the	LO1 LO2	2	Discussion of the topic of	Checklist for oral

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		14p. of 42

	Practical lesson 6 Leading clinical syndromes (hypo-, hyperthyroidism, hypo-, hyperglycemia) in endocrinology. Diagnostic value.	development of hypo-, hyperthyroidism, hypo-, hyperglycemia. Clinical features.	LO6		practical about classes, solving situational problems, learning and performing practical skills.	questioning, assessment of practical skills.
	Propaedeutics of internal diseases. SWIT/SIW 6 SIW tasks: preparation for the midterm control. Midterm control No. 2	Topics of lectures, practical classes, independent work, covered during 7-12 days of training.	LO1 LO2 LO6	1	Integrated monitoring of educational achievements with using control training cases, testing	Checklist testing
	Pharmacology. Practical lesson 3 Thyroid hormones and antithyroid drugs. Preparations parathyroid gland	Drugs used for hypothyroidism in adults. Drugs used for hyperthyroidism, their effect on metabolism. Antithyroid drugs, Glucocorticosteroids. Indications and contraindications. Side effects.	LO6	2	Work in small groups, discuss the topic, case study	Checklist
	Pharmacology. SWIT/SIW 3 SIW task: Sex hormone preparations.	Ovarian hormone preparations. Male sex gland hormones and antiandrogenic substances. Mechanism Actions, indications. Side effects. Features of use in childhood.	LO6	1/2	Discussion topics, presentation defense, essays, analysis of scientific articles, glossary	Checklist
	Intermediate certification					15 hours
9.	Teaching and assessment methods					
9.1	Lectures	Overview lectures				
9.2	Practical classes	Work in small groups, discussion of the topic, case study, description of macro- and micropreparations with a conclusion. Discussion of the topic of the practical lesson, solving situational problems, learning and performing practical skills, writing prescriptions, interpreting the results of clinical laboratory tests. research, solving situational problems.				
9.3	SWIT/SIW	Case study, analysis of scientific articles, project implementation, essay. Presentation and practical skills defense.				

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 15p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

9.4	Border control	Integrated monitoring of educational achievements with using control training cases, testing			
10.	Evaluation criteria				
10.1	Criteria for assessing the learning outcomes of the discipline				
№ L O	Name of learning outcomes	Unsatisfactor y	Satisfactorily	Good	Excellent
LO 1	1. Demonstrates knowledge and understanding of the basics of semiotics and syndromology, etiology, pathogenesis and morphogenesis of pathology of the digestive and endocrine systems	1. Doesn't have the basics semiotics and syndromology, does not deGood symptoms and syndromes. 1. Cannot explain the etiology,pathog enesis and morphogenesis pathological changesdigesti ve and endocrine systems	1. Does not have a basic understanding of semiotics and syndromology, makes gross errors in determining symptoms and syndromes in pathologies of the digestive and endocrine systems. 2. Makes mistakeswhen explaining etiology, pathogenesis and morphogenesis of pathological changes in the digestive and endocrine systems	1. Has a basic knowledge of semiotics and syndromology,will identify symptoms and syndromes. 2. Explains the etiology, pathogenesis and morphogenesis of pathological changes in the digestive and endocrine system, but allows for minor inaccuracies	1. Fluent in the basics semiotics and syndromology, independently determines symptoms and syndromes. 2. Explains etiology fluently,pathogenesis and morphogenesis pathological changes in the digestive systemoh and endocrine systems
LO 2	1. Has mastered the methods conducting a survey of adults, uses clinicalthinking in assembly information when drawing up a plan examinations; outlines the volume main and	1. Doesn't know the basics physiologicalpr ocesses in the gastrointestinal tract and hepatobiliarsys tems, not understands regulation digestion activities.	1. Makes mistakes in description basic physiological processes in the gastrointestinal tract and hepatobiliary system, explanation regulations	1. Describes basic physiologicalprocesses in the gastrointestinal tract and hepatobiliarsystems, understands regulation digestive activities. 2.Capable fully explain	1.Demonstratest main physiologicalwhat processes Gastrointestinal tract and hepatobiliaryoh system, deep understands regulation digestiveof the process.

ONTÜSTİK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ  SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»	
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology	47 / 11 16p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)	

	additional research to clarify the syndrome defeats at pathologies digestive and endocrine system	2. Not capable explain mechanisms digestive process	digestion. 2. Capable of making mistakes explain the mechanisms digestive process	mechanisms digestive about the process	2. Capable sketch mechanisms digestive of the process
LO 3	Uses clinical thinking in assembly information when interpretations results morphological, laboratory and instrumental research methods patients at pathologies digestive and endocrine system, formulates syndromic diagnosis, fills out medical history	1. Doesn't know main metabolic pathways that affect the function of the gastrointestinal tract and hepatobiliary systems. 2. Doesn't understand biochemical processes associated with digestive and hepatobiliary system.	1. Doesn't fully know the basics metabolic pathways, affecting the function of the gastrointestinal tract and hepatobiliary systems. 2. Poor understanding biochemical processes associated with digestion	1. Explains main metabolic what are the ways influencing on the function of the gastrointestinal tract and hepatobiliary systems. 2. Understands and understands well biochemical processes related with digestion	1. Owns skills clinical thinking, applies knowledge in collection information at interpretations results morphological, laboratory and instrumental methods research patients at gastrointestinal pathologies And hepatobiliary system, 2. formulates syndromic diagnosis, fills history diseases. 3. Effective decides situational tasks
LO 4	Reports information, ideas, problems and solutions patients and their members family, owns ethical standards and deontology in	Doesn't know how to apply knowledge of the gastrointestinal tract and hepatobiliary system in clinical context, not acquired skills	Not fully capable apply knowledge about Gastrointestinal tract and hepatobiliary system in clinical In this context,	Lists information about the gastrointestinal tract and hepatobiliary system in clinical context, conducts collection of complaints, clinical history and physical	Free demonstrates knowledge of the gastrointestinal tract and hepatobiliary system in clinical context, collects complaints, clinical history and physical

ONTÜSTİK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 17p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

	communication with patients, their relatives and colleagues	in collecting complaints, clinical anamnesis and physical examination of patients with gastrointestinal diseases and hepatobiliary systems for providing first aid, is not able to interpret the results of laboratory and instrumental studies	the collection of complaints, clinical history and physical examination of patients with diseases of the gastrointestinal tract and hepatobiliary system for the provision of first aid is carried out with errors, poorly oriented in the interpretation of the results of laboratory and instrumental studies	examination of patients with diseases of the gastrointestinal tract and hepatobiliary system with the provision of first aid, well versed in the interpretation of the results of laboratory and instrumental studies	examination of patients with gastrointestinal diseases and hepatobiliary system with the provision of first aid, is well versed in interpreting the results of laboratory and instrumental studies
LO 5	Identifies pathological processes at the organ and cellular levels, interprets data on the pathophysiology and morphology of diseases taking into account the clinical data of patients, makes conclusions, explains the patterns of development of complications and outcomes of pathology of the digestive and endocrine systems, evaluates the results of experimental	Incapable of identifying pathological processes at the organ and cellular levels, makes gross errors. 1. Cannot interpret data on the etiology, pathophysiology and morphology of diseases, taking into account the clinical data of patients. 2. Makes mistakes conclusions, poorly oriented and does not	Identifies pathological processes at the organ and cellular levels, but makes gross errors. 1. Cannot interpret independently data on the etiology, pathophysiology and morphology of diseases, taking into account the clinical data of patients. 2. Makes erroneous conclusions, has difficulty independently	Identifies pathological processes at the organ and cellular levels. 1. Interprets data on etiology, pathophysiology and morphology of diseases taking into account the clinical data of patients. 2. Draws conclusions, explains regularity development of complications and outcomes of pathologies of the digestive and endocrine systems. 3. Evaluates the results of experimental research, but allows for minor inaccuracies. Decides situational	Independent but determines pathological processes at the organ and cellular levels. 1. Independently interprets data on the etiology, pathophysiology and morphology of diseases, taking into account the clinical data of patients. 2. Draws conclusions, explains the patterns of development complications and outcomes of pathology of the digestive and endocrine systems

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 18p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

studies	explain the patterns of development of complications and outcomes of pathology of the digestive and endocrine systems. Incapable of judging	explain patternsdevelopment of complications and outcomes of pathologies of the digestive and endocrine systems. 3. It's difficultevaluate the results of experimental research, allows for fundamental	tasks	
LO 6	Selects medicinalmeans in accordance with the diagnosis, writes prescriptions, determines the dosage regimen, recognizes adverse effects of drugs, predicts the development of side effects and interactions of drugs used in pathology of the digestive and endocrine systems	DeGoods the overallpharmacological group of drugs. 1. writes outrecipe with making mistakes	Selects pharmacologic algroup of drugs by organs and systems. Writes a prescription using reference literature/sources	Selects medicinalmeans for the treatment and prevention of the most common diseases. 1. Writes out a prescriptionfor a given drug the drug is error-free. 2. Calculates the dose of medicine means
				Selects medicinaldrugs from various pharmacological groups in accordance with indications for use, contraindications and side effects 1. Writes outrecipe for 1. medicinalmeans in the most suitable dosage form depending on age, gender, functional characteristics. Calculates doses using various methods and determines the frequency and duration of use of the drug

10.2Methods and criteria for evaluation

Checklist for practical lesson

10.2. Methods and criteria for evaluation

Checklist for practical lesson

No.	Evaluation criteria	Level			
		Excellent	Good	Satisfactorily	Unsatisfactory

Practical classes:

ONTÜSTİK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 19p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

1	Written response to the questions of this assignment	30	21	15	0
2	Oral answer on questions of this task	30	21	15	0
3	Completing test tasks	12	8	6	0
4	Solving situational problems	28	20	14	0
	General:	100	70	50	0
Checklist of situational tasks					
N o.	Evaluation criteria				Points
1	Demonstrates original thinking when analyzing a situational task. Fully utilizes theoretical knowledge necessary to solve a given task. Demonstrates excellent knowledge of reference biochemical parameters when interpreting the proposed biofluid analysis data. Demonstrates the ability to draw logical conclusions on a situational task, while demonstrating a deep understanding of the necessary educational material.				"Excellent" 90-100%
2	Possesses the necessary knowledge to solve this situational task. Allows for minor inaccuracies when discussing this case. Is able to draw correct conclusions on the proposed situational task.				"Good" 70-89%
3	Allows minor inaccuracies when discussing a given task, has difficulty interpreting analyses proposed in a situational task. Draws conclusions with difficulty.				"Satisfactory" 50-69%
4	Allows fundamental errors in discussing a situational task. Passive, unable to draw appropriate conclusions.				"Unsatisfactory" 0-49%
Checklist for assessing a lesson					
Form of control		Grade		Evaluation criteria	
Carrying out practical work		Excellent corresponds to scores of 95-100 90-94		- completed the practical work on time and without any errors and submitted a report on it; - took an active part in the discussion of the research results; - made a well-reasoned conclusion, while demonstrating original thinking	
		Good corresponds to scores of 85-89 80-84 75-79 70-74		- completed the practical work on time and submitted a report on it, making minor mistakes; - took an active part in the discussion of the research results	
		Satisfactorily corresponds to scores of 65-69 60-64		- completed the practical work on time and submitted a report on it, having made fundamental mistakes;	

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ  SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»	
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology	47 / 11 20p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)	

	50-54	- was not active during the discussion and needed the teacher's help
	Does not meet the scores satisfactorily 25-49	- failed to submit a report on practical work on time, made serious mistakes, and did not complete all the practical work required by the program;
	Unsatisfactory corresponds to scores 0-24	- did not take part in the discussion of the results of the work
Case study	Excellent corresponds to scores of 95-100 90-94	- solved cases within a certain time; - gave full answers to all questions
	Good corresponds to scores of 85-89 80-84 75-79 70-74	- solved cases within a certain time; - gave complete answers to all questions; - made minor mistakes when solving cases
	Satisfactorily corresponds to scores of 65-69 60-64 50-54	- solved cases within a certain time; - gave incomplete answers to questions; - made fundamental mistakes when solving cases
	Unsatisfactory corresponds to scores 25-49	- solved cases incorrectly or did not solve them at all;
	Does not meet the scores satisfactorily 0-24	- made gross mistakes when solving cases
Interpretation of clinical laboratory test results	Excellent corresponds to scores of 95-100 90-94	- correctly, without any errors, interpreted the results of clinical laboratory tests; - made a reasonable conclusion
	Good corresponds to scores of 85-89 80-84 75-79 70-74	- correctly interpreted the results of clinical laboratory tests, making minor errors; - made a reasonable conclusion
	Satisfactorily corresponds to scores of 65-69 60-64 50-54	- correctly interpreted the results of clinical laboratory studies, having made fundamental errors; - made an unfounded conclusion
	Does not meet the scores satisfactorily 25-49	- incorrectly interpreted the results of clinical and laboratory tests, making gross errors;
	Unsatisfactory corresponds to scores 0-24	- did not draw a conclusion
Discussion of the topic	Excellent corresponds to scores of 95-100 90-94	- did not make any mistakes during the discussion; - was oriented in the theories, concepts and directions of the discipline and gave them a critical assessment;

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 21p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

		- used scientific achievements of other disciplines
	Good corresponds to scores of 85-89 80-84 75-79 70-74	- during the discussion he did not make any gross mistakes, but he did make inaccuracies and minor errors, which he corrected himself; - managed to systematize the program material with the help of the teacher
	Satisfactorily corresponds to scores of 65-69 60-64 50-54	- made fundamental mistakes during the discussion; - limited himself to only the educational literature specified by the teacher; - experienced Excellent difficulty in systematizing the material
	Does not meet the scores satisfactorily 25-49	- made gross mistakes during the discussion; - did not study the basic literature on the topic of the lesson; - failed to use the scientific terminology of the discipline
	Unsatisfactory corresponds to scores 0-24	
The test is assessed using a multi-point knowledge assessment system.	Excellent corresponds to scores of 90-94	- correctly completed 90-100% of test tasks
	Good corresponds to scores of 85-89 80-84 75-79 70-74	- correctly completed 70-89% of test tasks
	Satisfactorily corresponds to scores of 65-69 60-64 50-54	- correctly completed 50-69% of test tasks
	Unsatisfactory corresponds to scores 25-49	- completed less than 50% of test tasks correctly
	Unsatisfactory corresponds to scores 0-24	
Checklist for assessing practical skills "Propaedeutics of internal diseases"		
Form of control	Grade	Evaluation criteria
Implementation of practical skills	Excellent corresponds to grade A (4.0; 95-100%); A- (3.67; 90-94%)	- The student is well-versed in questioning and examining patients. Correctly and accurately selects questions when collecting anamnesis, accurately analyzes primary and secondary complaints, and is well-versed in the collected anamnesis of life and disease. - Conduct physical examination accurately: - general examination (examination of the skin and subcutaneous fat, visible mucous membrane, measurement of respiratory rate, heart rate, blood

ONTÜSTİK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ  SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»	
Department of Propaeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology	47 / 11 22p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)	

		pressure); - palpation (determination of resistance, pain, vocal fremitus, localization, amplitude, area, strength, pulsation, consistency, mobility, diameters, peristalsis, zones of pain, rigidity), - Percussion (determination of comparative, topographic boundaries of the lungs, area, excursion; determination of absolute and relative boundaries of the heart, configuration, diameter and vascular bundle; determination of the boundaries of the liver, spleen and stomach, percussion symptom); - auscultation (listening to vesicular and bronchial breathing, wheezing, crepitations, pleural friction noise in the lungs; listening to normal and pathological heart tones and murmurs, diastolic and systolic murmur). - Substantiates and makes a tentative syndromic diagnosis. - Used additional literature when preparing for the lesson. Systematizes the material on the topic. Communicates effectively in medical practice, objectively conveys relevant information, knows and uses the norms of ethics and deontology when performing skill;
	Good corresponds to B+ scores (3.33; 85-89%) B (3.0; 80-84%) B- (2.67; 75-79%) C+ (2.33; 70-74%)	- The student is well oriented when questioning and examining patients. Correctly selects questions when collecting anamnesis, accurately analyzes the main and secondary complaints, is well oriented in the collected anamnesis of life and disease. -It is good to conduct a physical examination: - general examination (examination of the skin and subcutaneous fat, visible mucous membrane, measurement of respiratory rate, heart rate, blood pressure); - palpation (determination of resistance, pain, vocal fremitus, localization, amplitude, area, strength, pulsation, consistency, mobility, diameters, peristalsis, zones of pain, rigidity), - Percussion (determination of comparative, topographic boundaries of the lungs, area, excursion; determination of absolute and relative boundaries of the heart, configuration, diameter and vascular bundle; determination of the boundaries of the liver, spleen and stomach, percussion symptom); - auscultation (listening to vesicular and bronchial breathing, wheezing, crepitations, pleural friction noise in the lungs; listening to normal and pathological heart tones and murmurs, diastolic and systolic murmur).

ONTÜSTİK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 23p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

		Makes a presumptive syndrome-based diagnosis without substantiating the data.
	Satisfactorily corresponds to points C (2.0; 65-69%) C- (1.67; 60-64%) D+ (1.33; 55-59%) D- (1.0; 50-54%)	- The student is able to navigate through questioning and examining patients, analyzes primary and secondary complaints with errors, and has poor understanding of the collected anamnesis of life and illness. - There are errors in the physical examination: - general examination (examination of the skin and subcutaneous fat, visible mucous membrane, measurement of respiratory rate, heart rate, blood pressure); - palpation (determination of resistance, pain, vocal fremitus, localization, amplitude, area, strength, pulsation, consistency, mobility, diameters, peristalsis, zones of pain, rigidity), - Percussion (determination of comparative, topographic boundaries of the lungs, area, excursion; determination of absolute and relative boundaries of the heart, configuration, diameter and vascular bundle; determination of the boundaries of the liver, spleen and stomach, tingling symptom); - auscultation (listening to vesicular and bronchial breathing, wheezing, crepitations, pleural friction noise in the lungs; listening to normal and pathological heart tones and murmurs, diastolic and systolic murmur). - <u>Unable to compare</u> relationship between the main symptoms and syndromes. Makes a presumptive syndrome-based diagnosis without substantiating the data Low level of communication in medical practice; subjectively conveys appropriate information;
	Unsatisfactory corresponds to FX points (0.5; 25-49%)	The student has no idea about the main and secondary complaints and is not familiar with the collected anamnesis of life and illness. - Is unable to carry out practical skills to interpret their results. Does not see the connection between objective physical examination data: - general examination (examination of the skin and subcutaneous fat, visible mucous membrane, measurement of respiratory rate, heart rate, blood pressure); - palpation (determination of resistance, pain, vocal fremitus, localization, amplitude, area, strength, pulsation, consistency, mobility, diameters, peristalsis, zones of pain, rigidity), - Percussion (determination of comparative, topographic boundaries of the lungs, area, excursion; determination

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 24p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

		of absolute and relative boundaries of the heart, configuration, diameter and vascular bundle; determination of the boundaries of the liver, spleen and stomach, percussion symptom); - auscultation (listening to vesicular and bronchial breathing, wheezing, crepitations, pleural friction noise in the lungs; listening to normal and pathological heart tones and murmurs, diastolic and systolic murmur).
	Unsatisfactory corresponds to F scores (0; 0-24%)	<u>Does not find and is not able to compare</u> relationship between the main symptoms and syndromes. Makes a presumptive syndrome-based diagnosis without substantiating the data - Did not participate in the group work. Incapable of communicating in medical practice; does not convey proper information, does not possess and is not able to use the norms of ethics and deontology when performing the skill. Gross errors when answering the teacher's questions, without using specific terminology in your answers.

Checklist for assessing answers to descriptions of macropreparations

N o	Evaluation Criteria/Evaluation	Excellent	Good	Satisfactorily	Unsatisfactory
1	Name of the organ	4	3	2	0
2	Organ size	10	7	5	0
3	Surface: condition of the capsule or serous membrane, dullness, shine, superposition	1	1	1	0
4	Characteristics of the pathological focus: Localization, size, shape (if an ulcer – condition of the bottom), color, consistency	5	4	2	0
5	Pathological diagnosis/conclusion				
6	Total	20	15	10	0

Checklist for assessing answers to descriptions of microscopic specimens

N o	Evaluation Criteria/Evaluation	Excellent	Good	Satisfactorily	Unsatisfactory
1	Name of an organ or tissue	4	3	2	0
2	Characteristics of pathological changes:	10	7	5	0

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 25p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

	localization, description				
3	Coloring	1	1	1	0
4	Pathological diagnosis/conclusion	5	4	2	0
5	Total	20	15	10	0

Checklist for SWIT /SIW

No.	Evaluation criteria	Level			
		Excellent	Good	Satisfactorily	Unsatisfactory
SIW and SWIT :					
1	Presentation Defense	50	35	25	0
2	Executionpractic al skills	50	35	25	0
	General:	100	70	50	0

Checklist for assessing written tasks during midterm assessment

Form control	Grade	Evaluation criteria
Solving situational problems using tickets	"Excellent" 90-100%	The student accurately analyzes the main and secondary complaints, and is well oriented in the collected anamnesis of life and illness. <u>Connects</u> data from objective physical examination (palpation, auscultation, percussion), correctly interprets data from laboratory and instrumental studies. Able to evaluate pathophysiological patterns of research results. <u>Finds and compares</u> the relationship between the main symptoms and syndromes. <u>Justifies and sets</u> presumptive syndrome diagnosis. The student answered the question on the task without error based on understanding, knowledge and clinical thinking regarding the given clinical situation. Conducts basic physical research on a given problem using an algorithm without errors (practical skill #1) Conducts basic physical research on a given problem using an algorithm without errors (practical skill #2) The student is excellent at understanding primary and secondary complaints and is well oriented in the collected anamnesis of life and illness.
	"Good" 70-89%	<u>Connects</u> data from objective physical examination (palpation, auscultation, percussion), incorrectly interprets data from laboratory and instrumental studies. There are errors in assessing the pathophysiological patterns of the research results. <u>Finds and compares</u> the relationship between the main symptoms and syndromes. <u>Puts</u> presumptive syndrome diagnosis without data

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 26p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

		substantiation The student did not answer the question on the task in full for this clinical situation. Conduct basic physical research on a given problem with gaps in the algorithm (practical skill #1) Conduct basic physical research on a given problem with gaps in the algorithm (practical skill #2) The student analyzes the main and secondary complaints with errors and has poor understanding of the collected anamnesis of life and illness.
	"Satisfactory" 50-69%	<u>Connects</u> data from objective physical examination (palpation, auscultation, percussion), correctly interprets data from laboratory and instrumental studies. Unable to assess pathophysiological patterns of research results. <u>Unable to compare</u> the relationship between the main symptoms and syndromes. <u>Puts</u> presumptive syndrome diagnosis without data substantiation The student answered the question on the problem without understanding, knowledge and clinical thinking on the given clinical situation. Conducts basic physical research on a given problem with fundamental errors (practical skill #1) Conducts basic physical research on a given problem with fundamental errors (practical skill #2)
	"Unsatisfactory" 0-49%	The student has no idea about the main and secondary complaints and is not familiar with the collected anamnesis of life and illness. <u>Doesn't see the connection</u> data from objective physical examination (palpation, auscultation, percussion), incorrectly interprets data from laboratory and instrumental studies. Unable to evaluate pathophysiological patterns of research results. <u>Does not find and is not able to compare</u> the relationship between the main symptoms and syndromes. <u>Puts</u> presumptive syndrome diagnosis without substantiation of data. The student gave an incorrect answer to the question on the task The demonstrated skill for this task does not correspond to the algorithm (practical skill #1) The demonstrated skill for this task does not correspond to the algorithm (practical skill #2)
Checklist for assessing the analysis of scientific articles		
Score in points By %	Unsatisfactory (0-49%)	Satisfactory (65-54%)
		Good (70-89%)
		Excellent (90-100%)

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 27p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

Evaluation criteria				
Structure of the article	1. Does not name the structural components of a scientific article	1. Does not follow the order of the structure of a scientific article when enumeration, skips components	1. Lists the structural components of a scientific article, but violates the order of the structure	1. Maintains the order of the structure of a scientific article listing: - Name - Authors - Publishing house - Summary - General part (introduction, materials and methods, Results and discussion - Conclusions - Bibliography
Analysis content scientific article	1. Does not understand the relevance of the problem, is not capable of discussion content of the article	1. Understands the relevance problems 2. Lists purpose of work, materials and methods used in the work 3. Understands the content scientific article Lists conclusions, list of references in this article	1. Suggests relevance problems 2. Explains the purpose of the work, materials and methods used in the work 3. Justifies the content of a scientific article 4. Justifies the selected list of literature in this article	1. On one's own substantiates and argues relevance of the problem 2. Explains the purpose of the work, used in the work Materials and methods 3. Freely expresses semantic content scientific article 4. Argues and justifies conclusions 5. Has the skill of using literature and justifies the selected list of references in this article
Answer to additional questions (on the topic of the article for the discipline)	1. Does not answer additional questions on the topic	1. Does not know the task at hand problem when answering additional questions	1. Applies the knowledge gained in practical training occupation knowledge on the topic when answering additional questions	1. Apply the knowledge gained during the practical lesson on the topic when answering additional questions, gives a deep and comprehensive argumentation
Multi-point system of knowledge assessment				
Letter Grading	Digital equivalent of points	Percentage content	Traditional system assessment	

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 28p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

A	4.0	95-100	Excellent
A -	3.67	90-94	
B +	3.33	85-89	Good
B	3.0	80-84	
B -	2.67	75-79	
C +	2.33	70-74	
C	2.0	65-69	Satisfactorily
C -	1.67	60-64	
D+	1.33	55-59	
D-	1.0	50-54	
FX	0.5	25-49	Unsatisfactory
F	0	0-24	

11. Educational resources

Electronic resources	Propaedeutics of internal diseases • Электронная библиотека ЮКМА - https://e-lib.skma.edu.kz/genres • Республиканская межвузовская электронная библиотека (РМЭБ) – http://rmebrk.kz/ • Цифровая библиотека «Aknurpress» - https://www.aknurpress.kz/ • Электронная библиотека «Эпиграф» - http://www.elib.kz/ • Эпиграф - портал мультимедийных учебников https://mbook.kz/ru/index/ • ЭБС IPR SMART https://www.iprbookshop.ru/auth • информационно-правовая система «Зан» - https://zan.kz/ru • Medline Ultimate EBSCO • eBook Medical Collection EBSCO • Scopus - https://www.scopus.com/
Electronic textbooks	Propaedeutics of internal diseases 1) Ivashkin, VTI Internal diseases propedeutics [Electronic resource]: textbook. - Electron. text data (142MB). - M: GEOTAR - Media, 2017. - email. wholesale Disk 2) Ishki aurular./Bimurzaev G.N., Zaripova G.K. , 2020. https://aknurpress.kz/reader/web/2594 3) Ishki aurular clinics. Erzhanova G.A., Mukhanova A.K., 2016/https://aknurpress.kz/reader/web/2370 4) Ishki aurular propedeuticsynan zhardayattyk tapsyrmalar Orazova B.O., Marchenko T.V., 2016/https://aknurpress.kz/reader/web/2348 5) Akhmetov Kayyrgali Zhaleluly. Ishki aurular propaedeutics for clinics. Almaty: “Evero”, 2020. – 262 bet https://elib.kz/ru/search/read_book/22/ 6) Internal non-infectious diseases with clinical radiological assessment KSU named after A. Baitursynov, 2011. – 94 p. http://rmebrk.kz/book/1024356 7) Ajay K. Singh. Joseph Loscalzo. The Brigham Intensive Review of Internal Medicine Question and Answer Companion: Oxford: Oxford University Press. 2014 //eBook Collection EBSCO 8) Thomas Ciesielski .Washington Manual General Internal Medicine Consult: Third edition. Philadelphia: Wolters Kluwer Health. 2017 //eBook Collection EBSCO 9) Internal diseases. V. 1[Electronic resource]: textbook / ed. V. S. Moiseeva. - 3rd ed., rev. and additionally - Electron. text data (66.5MB). - M.: GEOTAR - Media, 2015. - 960

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ  SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»	
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology	47 / 11 29p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)	

- 10) Internal diseases. V. 2 [[Electronic resource](#)]: textbook / ed. V. S. Moiseeva. - 3rd ed., rev. and additionally - Electron. text data (45.1MB). - M.: GEOTAR - Media, 2015. -895
 - 11) Propaedeutics of internal diseases: Textbook. / T.S. Ryabova, E.S. Ryss, V.Ya. Plotkin et al. - St. Petersburg: SpetsLit, 2015. - 414 p. <http://rmebrk.kz/book/1174389>
 - 12) Internal diseases in the work of a general practitioner: Study guide. / K.Zh. Sadykova, Sh.U. Skenderova, S.K. Sattiev. - Turkestan: Turan, 2017. - 96 p. <http://rmebrk.kz/book/1167635>
 - 13) Propaedeutics of Internal Diseases: Textbook. – 6th ed., Volume I reworked and additional – Almaty: Evero, 2020. – 400 p. https://elib.kz/ru/search/read_book/676/
 - 14) Propaedeutics of Internal Diseases: Textbook. – 6th ed., II - volumerevised and enlarged (Textbook for students of medical universities). – Almaty: Evero, 2020. – 212 p. https://elib.kz/ru/search/read_book/682
 - 15) Propaedeutics of Internal Diseases: Textbook. - 6th ed., III - volume revised and supplemented. (Textbook. Literature for students of medical universities). - Almaty: Evero, 2020. - 208 p. https://elib.kz/ru/search/read_book/684/
 - 16) Nursultanova S.D., Bakirova R.E., Mamashalieva S.B., Bekov E.K., Madieva L.S. Zhurek tamyr zhuyesinin aurular bar naukastardy tekseru әdisi zhәne tekhnikasy. Oku-әdistemelik kural.- Almaty, “Evero” baspasy. -2020. https://elib.kz/ru/search/read_book/705/
 - 17) Ishki arza aurular propaedeutics. Okulyk Aitmbet B.11 - Almaty “Evero” 2018, - 568 bet. https://elib.kz/ru/search/read_book/3086/
 - 18) Stryuk, Raisa Ivanovna.Internale diseases: in 3 parts: Part 1 textbook / R. I. Stryuk, I. V. Maev; [First. Moscow State Medical University named after I. M. Sechenov]. - Almaty: Evero, 2016. - URL: http://https://elib.kz/ru/search/read_book/2766/.
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 - 20) Stryuk, Raisa Ivanovna.Internale diseases: in 3 parts: Part 3 textbook / R. I. Stryuk, I. V. Maev. - Almaty: Evero, 2016. – URL:https://elib.kz/ru/search/read_book/2768/
 - 21) Pimenov, Yu. S. Internal Medicine. Volume 1: study guide / Yu. S. Pimenov, I. V. Roganova, L. N. Finko. - Moscow: REAVIZ, 2008. - 146 p. / Digital educational resource IPR SMART:<https://www.iprbookshop.ru/10141.html>
 - 22) Roganova, I. V. Internal Medicine. Volume 2: study guide / I. V. Roganova, V. F. Roganov, I. O. Prokhorenko. - Moscow: REAVIZ, 2008. - 132 p. / Digital educational resource IPR SMART:<https://www.iprbookshop.ru/10142.html>
 - 23) Clinical tasks in internal medicine: a tutorial / R. I. Saifutdinov, L. K. Kozlova, O. V. Bugrova [et al.]. - Orenburg: Orenburg State Medical Academy, 2012. - 152 p. - URL:<https://www.iprbookshop.ru/21817.html>
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1. Pathological physiology. Tazhiribelik sabaktarga nuskau [Electronic resource]: oku kuraly = Pathophysiology. Guide to practical exercises: textbook / Kaz. tiline aud. S. B. Zhutikova; ed. V. V. Novitsky. - Electron. text data (63.4MB). - M.: GEOTAR - Media, 2014. - 768 bet. email wholesale disk (CD-ROM)

ONTÜSTİK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 30p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

2. Adam physiology. Dynamics syzbalar atlases [Electronic resource]: okulyk / K. V. Sudakov [reinforced concrete]; Kazak tel. room M.K. Kankozha. - Electron. text data (105MB). - M.: GEOTAR - Media, 2017. - 464b.
3. Pathological physiology. Doszhanova M.P. , – Almaty: Evero, 2015 Central Bank Aknurpress / <https://www.aknurpress.kz/reader/web/2476>
4. Kravtsov V.I. et al. Test tasks on pathological physiology with elements of profiling / Edited by professor V.I. Kravtsov. - Almaty: Evero, 2020. - 116 p. https://www.elib.kz/ru/search/read_book/472/
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10. Ado A.D., Ado M.L., Pytskogo V.I., Poryadina G.V., Vladimirova Yu.L. Pathological physiology: textbook for medical universities. Volume 1. Almaty: Evero, 2020 - 248 p. https://www.elib.kz/ru/search/read_book/96/
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ONTÜSTİK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 31p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

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 20. Kogan, B. M. Anatomy, physiology and pathology of sensory systems: a tutorial / B. M. Kogan, K. V. Mashilov. - Moscow: Aspect Press, 2011. - 384 p. - ISBN 978-5-7567-0560-7. - Text: electronic // Digital educational resource IPR SMART: [site]. - URL: <https://www.iprbookshop.ru/8873.html>
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 4. Tusupbekova, M. M. Morphological atlas of general pathological processes [Electronic resource]: textbook / M. M. Tusupbekova. - Electronic text data. (1.03 Gb). - Almaty: Epigraph, 2016. -
 5. Strukov, A. I. Pathological anatomy [Electronic resource]: textbook - M.: GEOTAR - Media, 2013
 6. Kismanova G.N.. Pathology problems. Okulyk...- Almaty: Evero, 2020. – 92 bet Epigraph
 7. [https://www.elib.kz/ru/search/read_book/861/Nesep-zhynys arzalarynyn anatomy](https://www.elib.kz/ru/search/read_book/861/Nesep-zhynys_arzalarynyn_anatomy). Akhmad N.S., – Almaty: Evero, 2020 Central Bank Aknurpress
 8. <https://www.aknurpress.kz/reader/web/2357> Pathological anatomy Akhmetov Zh.B. , 2021. <https://aknurpress.kz/reader/web/2423> Zhumabekov, Kh.S., Derbyshev, K.Yu. Zhanuarlardyn pathological anatomy <http://rmebrk.kz/book/15133> Akhmetov Zh. B. Pathological anatomy - Okulyk. Volume 1 Almaty: Evero, 2020. - 360 bet. https://elib.kz/ru/search/read_book/144/ Akhmetov Zh. B. Pathological anatomy - Okulyk. Volume 2 Almaty: Evero, 2020. - 344 bet. https://elib.kz/ru/search/read_book/141/ Akhmetova N.Sh. Anatomy, physiology, pathology of the organs of hearing, speech,

ONTÜSTIK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 32p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

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Literature	Propaedeutics of internal diseases Main: 1) Vasilenko, V. Kh. PRopedeutics of internal diseases. T. 1.: Textbook / V. Kh. Vasilenko, V. V. Vasilenko; . - Almaty: Newbook, 2021. - 400. p.

ONTÜSTİK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»	
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology			47 / 11
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)			33p. of 42

- 2) Vasilenko, V. Kh. PRopedeutics of internal diseases. T. 2.: Textbook / V. Kh. Vasilenko, V. V. Vasilenko; . - Almaty: Newbook, 2021. - 212. p.
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- 4) Mukhin, N.A. **Ishki auralar** propaedeutics: okulyk. - M.: GEOTAR - Media, 2015
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- 6) Vasilenko, V. Kh. Ishki aurular propaedeutics. T. 2: okulyk / mem. tilge aud. K. Askambay. - Almaty: Evero, 2015. - 176 b. With
- 7) Aitbembet, B. N. **Ishki** aurularynyn propedeutics: okulyk Almaty: Evero, 2014. - 568 bet.-
- 8) Makolkin, V.I. Ishki aurular: okulyk. - M.: GEOTAR - Media, 2014. - 976 bet
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- 9) "Tynys alu zhuyesi" modules: integration = Module "Respiratory system": integrated textbook / S. K. Zhaugasheva [film]. - M.: "Litterra", 2014. - 272 editions.
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- 17) Vasilenko, VK Propaedeutics of internal diseases. 1-volume: textbook / - Almaty: "Evero", 2017. - 364 p.
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Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 34p. of 42
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Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 35p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

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Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		
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Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		47 / 11 38p. of 42

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Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		47 / 11 39p. of 42

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Department of Propaeudeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology	47 / 11 40p. of 42
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12. Discipline Policy

Requirements for students, attendance, behavior, grading policies, penalties, incentives, etc.

- observe medical ethics and deontology;
- no smoking in the academy;
- maintain cleanliness in the department;
- do not damage furniture in clasSIW oms;
- treat textbooks with care;
- maintain the appearance of a medical university student;
- maintain personal hygienestudents (short and clean nails, clean and ironed medical uniform, special change of shoes)
- observe safety regulations;
- during quarantine, wear medical masks and comply with sanitary and epidemiological regulations;
- do not miss classes without a good reason;

ONTÜSTİK-QAZAQSTAN MEDISINA AKADEMIASY «Оңтүстік Қазақстан медицина академиясы» АҚ		 SOUTH KAZAKHSTAN MEDICAL ACADEMY АО «Южно-Казахстанская медицинская академия»
Department of Propaedeutics of Internal Medicine, Department of Pathology and Forensic Medicine, Department of Pharmacology, Pharmacotherapy and Clinical Pharmacology		47 / 11 41p. of 42
Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

• classes missed for a valid reason must be made up in a timely manner, but only with permission from the dean's office and at a time determined by the teacher;

- don't be late for classes;
- have the necessary documentation in class: syllabus, methodological instructions for classes, lectures, notebook and textbook;
- prepare conscientiously for classes and lectures;
- be active during classes;
- do not engage in other activities during classes: do not talk, do not smoke, do not chew gum, do not eat food, do not use the phone, do not listen to music, do not read newspapers and magazines, do not prepare for classes in another subject;
- maintain silence and order during breaks;
- implement SLO in a timely manner.

Penalties for failure to complete sections of the work:

- if you miss lectures without a valid reason, your grade for the midterm assessment will be reduced – 1 point for each missed lecture;

If you miss a SLO without a valid reason, your midterm assessment score will be reduced by 2 points for each missed lesson;

- in case of a single violation of the discipline policy, the student is given a warning;

In case of systematic violation of the discipline policy, information about the student's behavior is transferred to the faculty dean's office.

Criteria for non-admission to final control:

A student who has received an unsatisfactory grade for one of the types of assessments (RC 1, RC 2, average assessment of the current assessment) is not admitted to the final assessment for the discipline.

13. Academic policy based on moral and ethical values of JSC "UKMA"

Academic policy based on the moral and ethical values of the academy

Regulations and Rules of YUKMA. Academic policy. P.4. Code of honor of the student

P.10. Organization of the educational process P.12. Grading policy

The final grade is calculated automatically based on the average grade of the current control, the average grade of the midterm control and the grade of the final control.

Final assessment(100%) = RD (60%) + IR (40%)

RD(60%) = RKsr (20%) + TKsr (40%)

RKSR = (PK1 + PK2): 2

Final assessment(100%) = PKCp x 0.2 + TKCp x 0.4 + IK x 0.4

RD- admission rating

IR- assessment of the final control

RKSR– average grade of the final assessment taking into account penalty points

TKSR- average assessment of current control taking into account SIW

RK1- midterm control 1

RK2- boundary control 2

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Working curriculum of the discipline "Digestive and endocrine systems in pathology" (Syllabus)		

14. Coordination, approval and revision			
Date of agreement with the Library and Information Center	Protocol No.	Full name of the head of the LIC	Signature
«25» 06 2025	N 7	Darbicheva R.I.	
Date of approval at the department	Protocol No.	Full name of the head of department	Signature
«26» 06 2025	N 11	Department of "Propaedeutics of Internal Diseases" MD, Professor Bekmurzaeva E.K.	
«26» 06 2025	N 13	Department of Pathology and Forensic Medicine, MD, Acting Professor Sadykova A.Sh.	
«26» 06 2025	N 11	Department of Pharmacology, Pharmacotherapy, and Clinical Pharmacology PhD, Associate Professor, Acting Professor Toksanbaeva Zh.S.	
Date of approval for AC EP	Protocol No.	Full name of the Chairman of the AC EP	Signature
«27» 06 2025	N 6	Auezhankyzy D.	