COURSE CATALOGUE (ECTS INFORMATION PACKAGE)

FIELD MEDICAL EMERGENCY RESCUE FIRST-CYCLE STUDIES



The graduate of three-year first-level course of the Emergency medicine for full-time students receives the professional title of *licencjat* (the equivalent of Bachelor's degree). The graduate possesses the general knowledge from the range of social sciences and the specialist knowledge and skills from the range of medical sciences, in this particularly within the range of medical rescue-acts in states of the sudden threat of the health and the life at adult and children. The graduate knows the foreign language on level of the proficiency B2 of the Common European Framework of Reference for Languages of the Council of Europe, can use specialist language from the range of social and medical sciences. The graduate is prepared to undertake the second-level studies, and also to continuing education in the system of the improvement of medical rescuers (paramedics) in compliance with regulations obligatory in Poland.

As the result of the education the graduate can:

- use the knowledge from the range of medical and social sciences during the performing of professional acts
- make an estimation of the state of health persons in case of the sudden hazard to health and undertake the medical rescue procedures
- protect persons being found in site of the event, and to take action preventing enlargement of the death toll and the degradation of the environment
- communicate with the person in the state of the sudden hazard to health and to give her
 psychical support, and also to communicate with the family of the patient and with other
 participants of the event
- predict behaviors of persons embraced with the emergency situation in order to prevent the occurrence of the panic,
- arrange the order of performing rescue procedures to victims
- participate in the evacuation of people from threatened region,
- perform medical rescue-acts in case of disasters, damages and accidents,
- diagnose states of the black-out, estimate its degrees, protect vital functions of unconscious persons using direct methods and with the use of the specialist equipment,
- perform cardiopulmonary resuscitation using direct methods and with the use of the specialist equipment and medicines in the medical life-saving in compliance with authorized in the medical rescue procedures, and also to give other health services to persons in sudden states
- fulfill the life-saving medical supervision over victims and ill in site of the event and during the transport
- keep and archive records of performed medical services
- co-work with members of the medical rescue team and with other workers of the health protection, and also to cooperate and to coordinate medical activities with other emergency services,
- organize and to lead training courses of the first-aid, the qualified first-aid and medical rescue-acts
- characterize by the resistance on the stress, to be in good shape, to be able to make prompt and proper decisions on the site of the event,
- understand basic problems of the public health systems functioning and concerning the health care policy in Poland and other countries of the European Union, and also the sort and the degree of biological, environmental, demographic, social and psychological threats of the health of the community of people,
- proceed according rules of the ethics,

- use the law regulations referring the carrying out occupation
- organize the worksite in compliance with epidemiological requirements, safeties and hygiene of the work, the ergonomics, fire prevention and the environmental protection,
- understand the need of the continuous improvement possessed professional skills.

Achieved qualifications will make possible to employ the graduate in public and not public integrated health care management units including Emergency Departments, teams of the paramedics, specialist emergency services and centers of teaching, district and regional Emergency Communication Centers, district- and provincial teams referring to matters of the elaboration of regional security plan for crisis, National Fire Fighting and Rescue System, in services seeing about with the safety and the hygiene of the work in industrial plants, as the medical coordinator at the protecting of mass-entertainments, in civic organizations and such associations as: The Voluntary Ambulance Service of the Tatra Mountains, the Water Voluntary Ambulance Service, the Polish Red Cross, the Polish Motor Union, voluntary and the other fire brigades, as the instructor of the first-aid in schools, industrial plants with the large risk of the accident rate, units of the fire brigade etc.

Admission requirements

The minimum requirement for admission to the degree program is the secondary school graduation certificate or an equivalent foreign document confirmed by the Polish education authorities. During the admission procedure the results in biology, foreign language and one of the selected subjects: Polish, chemistry or physics (physics and astronomy) from that certificate are taken into account.

Final examination

The diploma examination is an oral examination. During the examination the student should demonstrate a general understanding of field/specialization and the knowledge related to the dissertation.

The rules determining the final result of the studies are described in The Rules of Study at The Witelon University of Applied Sciences in Legnica. The final result is the sum of: 0,6 of the arithmetical mean of all the grades achieved during the study, 0,2 of the grade for the diploma thesis and 0,2 of the grade for the final exam.

Examination and assessment regulations

General examination and assessment regulations are described in detail in The Rules of Study at The Witelon University of Applied Sciences in Legnica. Assessment methods of individual courses are given in the programs of these courses.

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Recruitment : 2011 Stationary

Year I (1)

No	The subject	Number		sem	este	r I		БСТС		sen	ieste	r II		ЕСТС	Form
NO	The subject	of hours	L	С	A	S	SE	ECTS	L	С	A	S	SE	ECTS	of credit
		Subject	s of g	gener	al ed	luca	ıtion								
1	Physical education	60		30				0		30				0	credit
2	Information technologies	30								30				2	grade
3	Protection of intellectual property	20	20					1							grade
4	Health and safety at work and ergonomics	20	20					1							grade
5	Demography	20	20					1							grade
6	Biostatistic	20	20					1							grade
7	Basics of economics	20	20					1							grade
8	Basics of the organization and the management in the health protection	40							20	20				2	grade
9	Health promotion and education	40							30				10	2	grade
10	Basics of the social and health care policy	20	20					1							grade
11	International aspects of the public health	20							20					1	grade
			Mai	n sub	jects	7									
1	Qualified first aid	70							20	40		10		4	Exam (2)
2	Emergency medical operations	110							30	50		20	10	4	grade
		F	Appre	entice	eship	os									
1	Practice in the hospital rescue department	40			40			1							grade
2	Practice in the unit of the local State-Fire Brigade	80									80			1	grade
3	Fitness camp	40									40			1	grade

Recruitment: 2011 Stationary

Year I (2)

No	The subject	Number		sem	este	r I		ECTS		sen	ester	II		ECTS	Form
140	The subject	of hours	L	C	Α	S	SE	LC13	L	C	Α	S	SE	ECIS	of credit
				Basi	c sul	bjects									
1	Propaedeutics of the law	16							16					1	grade
2	Sociology	16	16					1							grade
3	Psychology	20	20					1							grade
4	Biophysics	16	16					1							grade
5	Biochemistry	20	10	10				1							grade
6	Public health	30	14			16		2							grade
7	Hygiene and epidemiology	30							20	10				1	grade
8	Anatomy	91	40	20		16	15	6							Exam (1)
9	Physiology	60	40	20				4							Exam (1)
10	Pathophysiology	60							40			20		4	Exam (2)
11	Biology with elements of Immunology and genetics	30				30		2							grade
12	Microbiology and parasitology	40							30	10				3	Exam (2)
13	First aid	50	20	30				2							grade
14	Didactic	16										16		1	grade
			(Option	nal s	ubjec	ts								
1	Philosophy*/ History of medicine*	50				40	10	2							grade
2	Ethics* / Logic *	50										40	10	2	grade
3	Interpersonal communication*/ Communicating in health care*	30				20	10	1							grade
4	Basics of the environmental protection*/ Basics of the environmental health*	30										20	10	1	grade
	Total number of hours:	1305	296	110	40	122	35		226	190	120	126	40		
	Total number of hours per semester(year)/ECTS:				603			30			702			30	
	Number of exams:	5			2						3				

Industrial Safety – I semester 4h Library training - I semester 4h

L: lectures C: classes

A: apprenticeships

S: seminars

SE: self education

Field: Medical emergency rescue Recruitment: 2011

Stationary

Year II

	ar 11	Number		seme	ester	III				sem	ester	IV			-
No	The subject	of	L	С	A	S	SE	ECTS	L	С	A	S	SE	ECTS	Form of credit
		hours							L		А	3	SE		creare
			Subjec		gene	ral ea			ı		ı				T .
1	English	60		30			10	1		30			10	1	grade
					ic su	bjects			I	I					- (0)
1	Pharmacology	50	36	14				3					<u> </u>	_	Exam (3)
2	Toxicology	45							20			20	5	2	grade
	D	240	20		n su	bjects			20		1	20	1.0		,
1	Emergency medicine	240	30	60		20	10	5	30	60		20	10	5	grade
2	Emergency medical operations	230	30	60		20	10	5	20	60		20	10	5	grade
3	Internal diseases	140	30	20		10	10	4	30	20		10	10	4	Exam (4)
4	Surgery	140	30	20		10	10	4	30	20		10	10	4	Exam (4)
5	Pediatrics	40							20	10		10		2	grade
6	Intensive care	40							20	10		10		2	grade
7	Obstetrics and the gynecology	50	30	20				3							Exam (3)
8	Diagnostic imaging in emergency medicine	20	20					1							grade
				Optio	nal s	subjec	ts								
1	Problems of social pathology * / Environmental microbiology*	40				30	10	1							grade
2	Marketing of Health Services*/ Economics and finance in health care*	40										30	10	1	grade
3	Basics transplantation*/ Basis for laboratory diagnosis*	40										30	10	1	grade
4	Rehabilitation and care of disabled.* Palliative care*	30				20	10	1							grade
5	Primary health care* Social welfare organization*	40				30	10	1							grade
6	Basics of the nourishment of the man*/ Basics of the health and epidemiological supervision *	40										30	10	1	grade
				Appr	entic	ceship	S								
1	Practice in the hospital rescue department	160									80			1	grade
2	Practice at the disposer of the Medical Rescue Teams.	80									80			1	grade
3	Fitness camp	40		40				1							grade
	Total number of hours:	1485	206	224	40	140	70		170	210	160	190	75		
	Total number of hours per semester(year)/ECTS:				680			30			805			30	
	Number of exams:	4			2						2				

Recruitment: 2011 Stationary

Year III

10	ar 111	Numban		sem	estei	· V				seme	cter	· VI			Eoma of
No	The subject	Number of hours	L	C	A	S	SE	ECTS	I.	С	A	S	SE	ECTS	Form of credit
		Sı	ıbject			~	~-	n.			7.1		DE		
1	English	60		30				1		30				2	Exam (6)
				Basic	subj	ects			l			l			(4)
1	Methodology of research	16	16					1							grade
	3.			Main	subj	ects				ı		l			
1	Emergency medicine	240	30	60		20	10	5	30	60		20	10	6	Exam (6)
2	Emergency medical operations	200	20	50		20	10	5	20	50		20	10	5	Exam (6)
3	Methodics of the instruction of the first-aid and the qualified first-aid	70							30	10		20	10	3	grade
4	Medicine of disasters	60							40			20		3	grade
5	Paediatrics	40	20	10		10		3							Exam (5)
6	Neurology	50	20	20		10		2							grade
7	Orthopaedics and the traumatology.	100	30	10		10		2	30	10		10		3	grade
8	Intensive care	40	20	10		10		3							Exam (5)
9	Forensic medicine	30							20			10		1	grade
10	Psychiatry	30	20	10				1							grade
11	Neonatology	40				30	10	1							grade
12	Infectious diseases	40										30	10	1	grade
13	Transfusiology	30										20	10	1	grade
14	Cardiology	46				36	10	2							grade
15	Specialist medical rescue	60							30			20	10	2	grade
16	Bachleors seminar	60				20	10	1				20	10	1	grade
			0	ption	al su	bjects		ı						ı	
1	Psychology in medical rescue* Organization of long-term care*	40										30	10	1	grade
2	Basis of occupational medicine* Bases of transport medicine*	40				30	10	1							grade
3	Basics of geriatric medicine*/ Basics of oncology*	40				30	10	1							grade
4	Prevention of lifestyle diseases*/ Prevention of occupational diseases*	40										30	10	1	grade
			A	pprei	ntice	ships						ı			
1	Practice in the hospital rescue department	40			40			1							grade
	Total number of hours:	1412	176	200	40	226	70		200	160	0	250	90		
	Total number of hours per semester(year)/ECTS:		712								700			30	
	Number of exams:	5	5 2								3				

Recruitment: 2011 Non-stationary

Year I (1)

	Tll-i4	Number		sem	este	r I		ECTS		sen	ıeste	r II		ECTS	Form of
No	The subject	of hours	L	С	A	S	SE	ECIS	L	С	A	S	SE	ECIS	credit
		Subjects	s of g	ener	al e	duc	ation								
1	Physical education	36		18				0		18				0	credit
2	Information technologies	30								18			12	2	grade
3	Protection of intellectual property	12	12					1							grade
4	Health and safety at work and ergonomics	12	12					1							grade
5	Demography	12	12					1							grade
6	Biostatistic	12	12					1							grade
7	Basics of economics	12	12					1							grade
8	Basics of the organization and the management in the health protection	20							12	8				1	grade
9	Health promotion and education	24							24					1	grade
10	Basics of the social and health care policy	12	12					1							grade
11	International aspects of the public health	12							12					1	grade
			Mair	ı sub	jects	S									
1	Qualified first aid	60							20	40				4	Exam (2)
2	Emergency medical operations	110							30	50		20	10	6	grade
		Α	ppre	entic	eship	os									
1	Practice in the hospital rescue department	40			40			1							grade
2	Practice in the unit of the local State-Fire Brigade	80									80			1	grade
3	Fitness camp	40									40			1	grade

Recruitment: 2011 Non-stationary

Year I (2)

No	The subject	Number		sem	este	r I		ECTS		sem	ester	II		ECTS	Form of
NO	The subject	of hours	L	C	A	S	SE	ECIS	L	C	A	S	SE		credit
				Bas	sic su	ıbjec	ts								
1	Propaedeutics of the law	16							16					1	grade
2	Sociology	16	16					1							grade
3	Psychology	16	16					1							grade
4	Biophysics	16	16					1							grade
5	Biochemistry	16	10	6				1							grade
6	Public health	30	14			16		2							grade
7	Hygiene and epidemiology	30							20	10				1	grade
8	Anatomy	91	40	20		16	15	7							Exam (1)
9	Physiology	40	40					4							Exam (1)
10	Pathophysiology	40							40					4	Exam (2)
11	Biology with elements of immunology and genetics	30				30		2							grade
12	Microbiology and parasitology	40							30	10				4	Exam (2)
13	First aid	50	20	30				2							grade
14	Didactic	16										16		1	grade
			(Optio	onal .	subje	ects								
1	Philosophy*/History of medicine*	18	10				8	1							grade
2	Interpersonal communication*/ Communicating in health care*	18							10				8	1	grade
	Total number of hours:	1035	244	74	40	80	29		204	154	120	54	36		
	Total number of hours per semester(year)/ECTS:				467			30			568			30	
	Number of exams:	5			2						3				

Industrial Safety – I semester 4h Library training - I semester 4h

L: lectures C: classes

A: apprenticeships

S: seminars

SE: self education

Recruitment: 2011 Non-stationary

Year II

		Number		seme	ster	Ш				sem	ester	IV			Form of
No	The subject	of hours	L	С	A	S	SE	ECTS	L	С	A	S	SE	ECTS	credit
			Subj	ects of	gen	eral e	educa	tion							
1	English	60		18			12	1		18			12	1	grade
				Ва	sic si	ubjec	ts								
1	Pharmacology	50	36	14				4							Exam (3)
2	Toxicology	45							20			20	5	2	grade
				Ma	iin si	ıbjec	ts								
1	Emergency medicine	160	30	50				5	30	50				5	grade
2	Emergency medical operations	210	30	50		20	10	6	20	50		20	10	6	grade
3	Internal diseases	120	30	10		10	10	4	30	10		10	10	4	Exam (4)
4	Surgery	120	30	10		10	10	4	30	10		10	10	4	Exam (4)
5	Pediatrics	40							20	10		10		2	grade
6	Intensive care	40							20	10		10		2	grade
7	Obstetrics and the gynecology	50	30	20				2							Exam (3)
8	Diagnostic imaging in emergency medicine	20	20					1							grade
				Opti	onal	subje	ects								
1	Primary health care*/ Social welfare organization*	30				18	12	2							grade
2	Basics of the nourishment of the man*/ Basics of the health and epidemiological supervision*	30										18	12	2	grade
				App	renti	cesh	ips								
1	Practice in the hospital rescue department	80									80			1	grade
2	Practice at the disposer of the Medical Rescue Teams.	80									80			1	grade
3	Fitness camp	40			40			1							grade
	Total number of hours:	1175	206	172	40	58	54		170	158	160	98	59		
	Total number of hours per semester(year)/ECTS:				530			30			645			30	
	Number of exams:	4			2						2				

Recruitment: 2011 Non-stationary

Year III

		Number		sem	ester	· V				seme	ster	· VI			Form of
No	The subject	of hours	L	С	A	S	CE	ECTS	L	С	Α	S	SE	ECTS	credit
NO	The subject		ubjeci				•		L	C	Α	ا د	SE	LOIS	
1	English	60	lojeci	18	ener	ai eai	12	1		18			12	2	Exam(6)
	Ligion			Basic	sub	iects									LAum(0)
1	Methodology of research	16	16	Dasie	Suc	jeers		1							zaliczenie
-	Wethodology of research		L	Main	sub	iects	<u> </u>								
1	Emergency medicine	170	30	50		,		5	30	50			10	7	Exam (6)
2	Emergency medical operations	190	20	50		10	10	6	20	50		20	10	7	Exam (6)
	Methodics of the instruction														
3	of the first-aid and	45							30	10			5	2	grade
4	the qualified first-aid	60							40			20		3	ama da
5	Medicine of disasters	40	20	10		10		3	40			20		3	grade Exam (5)
6	Paediatrics	30	20	10		10		2							grade
7	Neurology	90	30	10		10		2	30	10		10		3	
8	Traumatology.	40	20	10		10		3	30	10		10		3	grade Exam (5)
9	Intensive care	30	20	10		10		3	20			10		1	grade
10	Forensic medicine	30	20	10				1	20			10		1	grade
11	Psychiatry	12	20	10		12		1							grade
12	Neonatology Infectious diseases	16				12		1				12	4	1	grade
13	Transfusiology	16										12	4	1	grade
14	Cardiology	12				12		1				12	4	1	grade
15	Specialist medical rescue	46				12		1	30			12	4	2	grade
16	Bachleors seminar	60				20	10	1	30			20	10	1	grade
10	Bacilieors seminar	00		Option	al ci			1				20	10	1	grade
	Psychology in medical			риоп	ai si	ыјест	3								
1	rescue*/ Organization	30				18	12	2							grade
	of long-term care*														
				Appre	ntice	eships								ı	_
1	Practice in the hospital rescue department	40			40			1							grade
	Total number of hours:	1033	176	158	40	102	44		200	138	0	116	59		
	Total number of hours per semester(year)/ECTS:				520			30			513			30	
	Number of exams:	5			2						3				

Field: Medical emergency rescue Recruitment: 2010

Stationary

Year I (1)

No	The subject	Number		sem	este	r I		ECTS		sem	este	r II		ECTS	Form
NO	The subject	of hours	L	С	A	S	SE	ECIS	L	C	A	S	SE	ECIS	of credit
		Subjects of	gene	eral e	educ	atic	on								
1	Physical education	60		30				0		30				0	credit
2	Information technologies	30								30				2	grade
3	Protection of intellectual property	20	20					1							grade
4	Health and safety at work and ergonomics	20	20					1							grade
5	Demography	20	20					1							grade
6	Biostatistic	20							20					1	grade
7	Basics of economics	20	20					1							grade
8	Basics of the organization and the management in the health protection	40							20	10			10	1	grade
9	Health promotion	40							30				10	1	grade
10	Basics of the social and health care policy	20	20					1							grade
11	International aspects of the public health	20							20					1	grade
		Ма	in si	ıbjec	ts										
1	Qualified first aid	50	10	10				1	10	30				2	Exam (2)
2	Emergency medical operations	110							30	50		20	10	5	grade
		App	renti	cesh	ips										
1	Practice in the hospital rescue department	40			40			1							grade
2	Practice in the unit of the local State-Fire Brigade	80									80			1	grade
3	Fitness camp	40									40			1	grade

Recruitment: 2010 Stationary

Year I (2)

	ai 1 (2)	Number		sem	ester	· I				sem	ester	II			Form
No	The subject	of hours	L	С	Α	S	SE	ECTS	L	С	A	S	SE	ECTS	of credit
		110015	В	asic s	ubje	cts							l		
1	Propaedeutics of the law	16							16					1	grade
2	Sociology	21	16				5	1							grade
3	Psychology	20							20					1	grade
4	Biophysics	20	10	10				1							grade
5	Biochemistry	20	10	10				1							grade
6	Public health	46	30			16		2							grade
7	Hygiene and epidemiology	30							20	10				1	grade
8	Anatomy	90	60	30				6							Exam (1)
9	Physiology	70	50	20				5							Exam (1)
10	Pathophysiology	75							50	25				5	Exam (2)
11	Biology with elements of Immunology and genetics	30	20	10				2							grade
12	Microbiology and parasitology	30	20	10				2							Exam (1)
13	First aid	40	20	20				2							grade
14	Didactic	20							10	10				1	grade
			Opt	tional	subj	iects									
1	Philosophy*/ History of medicine*	30	30					1							grade
2	Ethics* / Logic *	30							30					1	grade
3	Marketing of health care*/ Palliative care*	40										40		2	grade
4	History of the medical life-saving in Poland and in the world*/ Economics and the financing in the health protection*	20										20		1	grade
5	The swimming pool*/ The self-defence*	30								30				1	grade
6	Basics of the environmental protection*/ Basics of the environmental health*	20							20					1	grade
	Total number of hours:	1338	376	150	40	16	5		296	225	120	80	30		
	Total number of hours per semester(year)/ECTS:				587			30			751			30	
	Number of exams:	5			3						2				

Industrial Safety – I semester 4h Library training - I semester 4h

L: lectures

C: classes

A: apprenticeships

S: seminars

SE: self education

Recruitment: 2010 Stationary

Year II

	u 11			seme	ster	Ш				sem	ester	IV			
No	The subject	Number of hours					ar.	ECTS					a.e.	ECTS	Form of credit
		of nours	L	C	A	S	SE		L	C	A	S	SE		crean
		S	ubject	s of g	ener	al edu	ıcatio	n							
1	English	60		30				1		30				1	grade
				Basic	sub	jects							_		
1	Pharmacology	50	36	14				3							Exam (3)
2	Toxicology	45							20			20	5	2	grade
				Main	subj	iects									
1	Emergency medicine	240	30	60		20	10	5	30	60		20	10	5	grade
2	Emergency medical operations	240	30	60		20	10	5	30	60		20	10	5	grade
3	Internal diseases	140	30	20		10	10	4	30	20		10	10	4	Exam (4)
4	Surgery	140	30	20		10	10	4	30	20		10	10	4	Exam (4)
5	Pediatrics	40							20	10		10		2	grade
6	Intensive care	40							20	10		10		2	grade
7	Obstetrics and the gynecology	50	30	20				4							Exam (3)
8	Diagnostic imaging in emergency medicine	20	20					1							grade
			C	Option	al su	bject	s						_		
1	The problem of social pathology*/ Environmental Microbiology*	30				20	10	1							grade
2	Interpersonal communication*/ Communicating in health care*	40										30	10	1	grade
3	Interpersonal communication* Communicating in health care*	30				20	10	1							grade
4	Rehabilitation and care of disabled.* Basics of enterprise*	30										20	10	1	grade
5	Primary health care* Social welfare organization*	30										20	10	1	grade
			1	Appre	ntice	ships									
1	Practice in the hospital rescue department	160									80			1	grade
2	Practice at the disposer of the Medical Rescue Teams.	80									80			1	grade
3	Fitness camp	40		40				1							grade
	Total number of hours:	1425	206	224	40	100	60		180	210	160	170	75		
	Total number of hours per semester(year)/ECTS:				630			30			795			30	
	Number of exams:	4			1						3				

Recruitment: 2010 Stationary

Year III

	वा ।।।	Number		sem	este	r V				semo	este	r VI			Form of
No	The subject	of hours	L	С	Α	S	SE	ECTS	L	С	A	S	SE	ECTS	credit
			Subjec	ets of	gene.	ral ed	ucatio	1 0n							
1	English	60		30				1		30				2	Exam (6)
			ı	Basi	ic sui	bjects									
1	Methodology of research	16	16					1							grade
			L	Mai	n sul	bjects								,	_
1	Emergency medicine	240	30	60		20	10	5	30	60		20	10	6	Exam (6)
2	Emergency medical operations	200	20	50		20	10	4	20	50		20	10	5	Exam (6)
3	Methodics of the instruction of the first-aid and the qualified first-aid	70							30	10		20	10	3	grade
4	Medicine of disasters	60							40			20		3	grade
5	Paediatrics	40	20	10		10		3							Exam (5)
6	Neurology	50	20	20		10		2							Exam (5)
7	Orthopaedics and the traumatology.	100	30	10		10		2	30	10		10		3	grade
8	Intensive care	40	20	10		10		3							Exam (5)
9	Forensic medicine	30							20			10		1	grade
10	Psychiatry	30	20	10				1							grade
11	Neonatology	40				30	10	1							grade
12	Infectious diseases	40										30	10	1	grade
13	Transfusiology	30										20	10	1	grade
14	Cardiology	42				32	10	2							grade
15	Specialist medical rescue	60							30			20	10	2	grade
16	Bachleors seminar	60				20	10	1				20	10	1	grade
				Optio	nal s	ubjec	ts								
1	Basics transplantation*/ Basis for laboratory diagnosis*	40				20	20	1							grade
2	Basis of occupational medicine*/ Bases of transport medicine*	40										20	20	1	grade
3	Basics of geriatric medicine*/ Basics of oncology*	40				20	20	1							grade
4	Prevention of lifestyle diseases*/ Prevention of occupational diseases*	40										20	20	1	grade
5	Basics of the nourishment of the man*/ Basics of the health and epidemiological supervision *	30				20	10	1							grade
				Appr	entic	eship.	s								
1	Practice in the hospital rescue department	40			40			1							grade
	Total number of hours:	1438	176	200	40	222	100		200	160	0	230	110		
	Total number of hours per semester(year)/ECTS:	3: 738 3			30			700			30				
	Number of exams:	6			3						3				

Recruitment: 2010 Non-stationary

Year I (1)

		Number		sem	este	r I				sen	neste	er II			Form of
No	The subject	of hours	L	С	A	S	SE	ECTS	L	С	A	S	SE	ECTS	credit
		Subjects of	of gei	nerai	l edu	cat	ion								
1	Physical education	36		18				0		18				0	credit
2	Information technologies	18								10			8	2	grade
3	Protection of intellectual property	12	12					1							grade
4	Health and safety at work and ergonomics	12	12					1							grade
5	Demography	12	12					1							grade
6	Biostatistic	12							12					1	grade
7	Basics of economics	12	12					1							grade
8	Basics of the organization and the management in the health protection	24							10	8			6	1	grade
9	Health promotion	24							14				10	1	grade
10	Basics of the social and health care policy	12	12					1							grade
11	International aspects of the public health	12							12					1	grade
		М	ain s	subje	ects										
1	Qualified first aid	60	10	10				1	10	30				2	Exam (2)
2	Emergency medical operations	110							30	50		20	10	5	grade
		Ap_I	pren	tices	hips										
1	Practice in the hospital rescue department	40			40			1							grade
2	Practice in the unit of the local State-Fire Brigade	80									80			1	grade
3	Fitness camp	40									40			1	grade

Recruitment: 2010 Non-stationary

Year I (2)

No	The subject	Number		sem	ester	· I		ECTS		sem	ester	II		ECTS	Form of
110	The subject	of hours	L	С	A	S	SE	EU13	L	С	Α	S	SE	EU13	credit
				Basi	c sub	ject	s								
1	Propaedeutics of the law	16							16					1	grade
2	Sociology	21	16				5	1							grade
3	Psychology	20							20					1	grade
4	Biophysics	20	10	10				1							grade
5	Biochemistry	20	10	10				1							grade
6	Public health	46	30			16		2							grade
7	Hygiene and epidemiology	30							20	10				1	grade
8	Anatomy	90	60	30				6							Exam (1)
9	Physiology	70	50	20				5							Exam (1)
10	Pathophysiology	75							50	25				5	Exam (2)
11	Biology with elements of immunology and genetics	30	20	10				2							grade
12	Microbiology and parasitology	30	20	10				2							Exam (1)
13	First aid	40	20	20				2							grade
14	Didactic	20							10	10				1	grade
			(Optior	ıal sı	ubje	cts								
1	Philosophy*/History of medicine*	18	10				8	1							grade
2	Ethics* / Logic *	18							10				8	1	grade
3	Marketing of health care*/ Palliative care*	24										24		2	grade
4	History of the medical life- saving in Poland and in the world*/ Economics and the financing in the health protection*	12										12		1	grade
5	The swimming pool*/ The self-defence*	18								18				1	grade
6	Basics of the environmental protection*/ Basics of the environmental health*	12							12					1	grade
	Total number of hours:	1146	316	138	40	16	13		226	179	120	56	42		
	Total number of hours per semester(year)/ECTS:			5	523			30			623			30	
	Number of exams:	5			3						2				

Industrial Safety – I semester 4h Library training - I semester 4h

L: lectures

C: classes

A: apprenticeships

S: seminars

SE: self education

Recruitment: 2010 Non-stationary

Year II

	11 11	NT 1		seme	ster	Ш				sem	ester	IV			F
No	The subject	Number of hours	L	С	A	S	SE	ECTS	L	С	A	S	SE	ECTS	Form of credit
			Subje	ects of	gene	eral e	educa	ıtion							
1	English	60		18			12	1		18			12	1	grade
				Bas	sic sı	ıbjec	ts								
1	Pharmacology	50	36	14				3							Exam (3)
2	Toxicology	45							20			20	5	2	grade
				Ма	in su	ıbjeci	ts						_		
1	Emergency medicine	160	30	50				5	30	50				5	grade
2	Emergency medical operations	210	30	50		20	10	7	30	50		20		6	grade
3	Internal diseases	120	30	10		10	10	4	30	10		10	10	4	Exam (4)
4	Surgery	120	30	10		10	10	4	30	10		10	10	4	Exam (4)
5	Pediatrics	40							20	10		10		2	grade
6	Intensive care	40							20	10		10		2	grade
7	Obstetrics and the gynecology	50	30	20				2							Exam (3)
8	Diagnostic imaging in emergency medicine	20	20					1							grade
				Optio	onal	subje	ects								
1	Interpersonal communication*/ Communicating in health care*	46										30	16	2	grade
2	Interpersonal communication* /Communicating in health care*	36				20	16	2							grade
				App	renti	ceshi	ps								
1	Practice in the hospital rescue department	80									80			1	grade
2	Practice at the disposer of the Medical Rescue Teams.	80									80			1	grade
3	Fitness camp	40			40			1							grade
	Total number of hours:	1197	206	172	40	60	58		180	158	160	110	53		
	Total number of hours per semester(year)/ECTS:				536			30			661			30	
	Number of exams:	4			2						2				

Recruitment: 2010 Non-stationary

Year III

	11 111	Number		seme	ester	v				seme	ester	· VI			Form of
No	The subject	of hours	L	С	A	S	SE	ECTS	L	С	Α	S	SE	ECTS	credit
140	The subject		iects o					LOIS	L	C	Α		SE	LOIS	
1	English	60		18		cance	12	1		18			12	2	Exam(6)
	6		Вс	ısic sı	ıbjec	rts					<u> </u>	ı			(2)
1	Methodology of research	16	16					1							grade
			M	ain su	ıbjec	ts									<u> </u>
1	Emergency medicine	170	30	50				6	30	50			10	7	Exam (6)
2	Emergency medical operations	190	20	50		10	10	6	20	50		20	10	7	Exam (6)
3	Methodics of the instruction of the first- aid and the qualified first-aid	45							30	10			5	2	grade
4	Medicine of disasters	60							40			20		3	grade
5	Paediatrics	40	20	10		10		3							Exam (5)
6	Neurology	30	20	10				2							grade
7	Traumatology.	90	30			10		3	30	10		10		3	grade
8	Intensive care	40	20	10		10		3							Exam (5)
9	Forensic medicine	30							20			10		1	grade
10	Psychiatry	30	20	10				1							grade
11	Neonatology	22				12	10	1							grade
12	Infectious diseases	22										12	10	1	grade
13	Transfusiology	22										12	10	1	grade
14	Cardiology	22				12	10	1							grade
15	Specialist medical rescue	52							30			12	10	2	grade
16	Bachleors seminar	60				20	10	1				20	10	1	grade
			App	prenti	cesh	ips									
1	Practice in the hospital rescue department	40			40			1							grade
	Total number of hours:	1041	176	158	40	84	52		200	138	0	116	77		
	Total number of hours per semester(year)/ECTS:				510			30			531			30	
	Number of exams:	5			2						3				

Field: Medical emergency rescue Recruitment: 2009

Stationary

Year I (1)

No	The subject	Number		sem	este	r I		ГСТС		sem	este	r I	I	ГСТС	Form of
NO	The subject	of hours	L	С	A	S	SE	ECTS	L	С	Α	S	SE	ECTS	credit
		Basi	c sul	oject.	s										
1	Propaedeutics of the law	15							15					1	grade
2	Sociology	15	15					1							grade
3	Psychology	30							15	15				1	grade
4	Biophysics	20	10	10				1							grade
5	Biochemistry	20	10	10				1							grade
6	Public health	45	30	15				1							grade
7	Hygiene and epidemiology	30							20	10				1	grade
8	Anatomy	90	60	30				5							Exam (1)
9	Physiology	75	50	25				5							Exam (1)
10	Pathophysiology	75							50	25				4	Exam (2)
11	Biology with elements of Immunology and genetics	30	20	10				2							Exam (1)
12	Microbiology and parasitology	45	30	15				2							Exam (1)
13	First aid	30	10	20				1							grade
14	Didactic	15							10	5				1	grade
15	Basics of economics	15	15					1							grade
16	Basics of the organization and the management in the health protection	30							20	10				1	grade
17	Demography	15	15					1							grade
18	Biostatistic	15	15					1							grade
19	Health promotion and education.	30							20	10				1	grade
20	Basics of the social and health policy and social insurance	20	20					1							grade
21	International aspects of public health	15							15					1	grade
22	Basics of the environmental protection*/ Basics of the environmental health*	20							20					1	grade

Recruitment: 2009 Stationary

Year I (2)

		Number		seme	ster	Ι				seme	ester	II			Form of
No	The subject	of hours	L	C	A	S	SE	ECTS	L	C	A	S	SE	ECTS	credit
		Subje	cts of	gener	ral e	duc	ation	!							
1	Physical education	60		30				1		30				1	grade
2	English*/ German*	60		30				1		30				1	grade
3	Information technologies	30								30				2	grade
4	Philosophy	30	30					1							grade
5	History of medicine	30							30					1	grade
6	Ethics* / Logic *	30							30					1	grade
7	Protection of intellectual property	15	15					1							grade
8	Health and safety at work and ergonomics	15	15					1							grade
			Ма	in sul	jects	S									
1	Qualified first aid	60	10	10				1	10	30				4	Exam (2)
2	Emergency medical operations	100							30	70				5	grade
			App	rentic	eship	os									
1	Practice in the unit of the local State-Fire Brigade	80									80			2	grade
2	Fitness camp	40									40			1	grade
3	Practice in the hospital rescue department*/ Practice at the disposer of the Medical Rescue Teams*/ Board of admissions*	40			40			1							grade
	Total number of hours:	1285	370	205	40	0	0		285	265	120	0	0		
	Total number of hours per semester(year)/ECTS:		615					30			670			30	
	Number of exams:	6			4						2				

Industrial Safety – I semester 4h Library training - I semester 4h

L: lectures

C: classes

A: apprenticeships

S: seminars

SE: self education

Field: Medical emergency rescue Recruitment: 2009

Stationary

Year II

		Number		seme	ster	III				seme	ester	IV			Earm of
No	The subject	of hours	L	С	Α	S	SE	ECTS	L	С	A	S	SE	ECTS	Form of credit
		Sul	ojects	of ger	ıeral	edu	catio	n							
1	English*/ German*	90		30			15	1		30			15	2	Exam (4)
			В	asic s	subje	cts									
1	Pharmacology	60	40	20				4							Exam (3)
2	Toxicology	50							30	20				2	Exam (4)
3	Basics of social communication*/ Basics of social insurance*	40							20	10		10		1	grade
4	Problems of social pathology * / Environmental microbiology*	40	20	20				1							grade
5	The swimming pool*/ The self-defence*	60		30				1		30				1	grade
			N	1ain s	ubje	cts									
1	Emergency medicine	260	30	80			20	6	30	80			20	6	grade
2	Emergency medical operations	230	30	70		10	10	6	20	70		10	10	4	grade
3	Internal diseases	140	30	10		20	10	3	30	10		20	10	3	Exam (4)
4	Surgery	185	30	30		20	10	4	30	30		20	15	5	Exam (4)
5	Pediatrics	60							20	20		10	10	2	grade
6	Intensive care	60							20	30		10		2	grade
7	Obstetrics and the gynecology	50	30	20				2							grade
8	Diagnostic imaging in emergency medicine	30	16				14	1							grade
			Ap	preni	ticesi	hips									
1	Practice in the hospital rescue department	80									80			1	grade
2	Practice at the disposer of the Medical Rescue Teams.	80									80			1	grade
3	Fitness camp	40			40			1							grade
	Total number of hours:	1555	226	310	40	50	79		200	330	160	80	80		
	Total number of hours per semester(year)/ECTS:			7	705			30			850			30	
	Number of exams:	5			1						4				

Field: Medical emergency rescue Recruitment: 2009

Stationary

Year III

	ar III	Number		sem	este	r V				sem	este	r VI			Form
No	The subject	of hours	L	С	Α	S	SE	ECTS	L	С	A	S	SE	ECTS	of credit
				Basic	subj	ects	l	l		l		l	l	l .	
1	Methodology of research	16	16					1							grade
2	Communication in the health protection*/Old and new social threats*	34				24	10	2							grade
3	Basics of medical jurisprudence*/Organization of long-term care*	34										24	10	2	grade
4	Marketing of healthcare services*/ Paliative care*	34										24	10	2	grade
5	History of the medical life-saving in Poland and in the world*/ Economics and the financing in the health protection*	34				24	10	2							grade
6	Basics transplantation*/ Basis for laboratory diagnosis*	34				24	10	2							grade
7	Basis of occupational medicine*/ Bases of transport medicine*	34										24	10	2	grade
8	Basics of the nourishment of the man*/ Basics of the health and epidemiological supervision *	34										24	10	2	grade
				Main	subje	ects									
1	Emergency medicine	220	30	60			20	5	30	60			20	6	Exam (6)
2	Emergency medical operations	190	20	40		10	10	4	20	60		20	10	5	Exam (6)
3	Methodology of the instruction of the first-aid and the qualified first-aid	70							30	10		20	10	2	grade
4	Medicine of disasters	70							40			20	10	2	grade
5	Paediatrics	40	20	10		10		2							Exam (5)
6	Neurology	50	20	20		10		2							grade
7	Traumatology.	100	30	10		10		2	30	10		10		2	Exam (6)
8	Intensive care	70	20	10		10		2							Exam (5)
9	Forensic medicine	30							20			10		1	grade
10	Psychiatry	30	20	10				1							grade
11	Neonatology	30				20	10	1							grade
12	Infectious diseases	30										20	10	1	grade
13	Transfusiology	30				20	10	1							grade
14	Cardiology	36				26	10	1							grade
15	Specialist medical rescue	40							20			10	10	2	grade
16	Bachelor's Seminar	60				20	10	1				20	10	1	grade
			A	ppren	tices	ships									
1	Practice in the hospital rescue department	40			40			1							grade
	Total number of hours: 1360			160	40	208	100		190	140	0	226	120		
	Total number of hours per semester(year)/ECTS:				684			30			676			30	
	Number of exams:	3			3						0				

Recruitment: 2009 Non-stationary

Year I (1)

No	II 1 (1)	Number of		sem	este	er l		ЕСТС		sem	este	r I	I	ECTS	Form of
NO	The subject	hours	L	С	A	S	SE	ECTS	L	С	A	S	SE	ECIS	credit
		Basic	sub	jects											
1	Propaedeutics of the law	16							16					1	grade
2	Sociology	16	16					1							grade
3	Psychology	16							10				6	1	grade
4	Biophysics	16		16				1							grade
5	Biochemistry	16	8	8				1							grade
6	Public health	35	20				15	2							grade
7	Hygiene and epidemiology	30							20	10				1	grade
8	Anatomy	90	60	30				6							Exam (1)
9	Physiology	75	30	25			20	5							Exam (1)
10	Pathophysiology with elements of patomorphology	75							25	25			25	4	Exam (2)
11	Biology with elements of immunology and genetics	20	20					2							Exam (1)
12	Microbiology and parasitology	25	25					2							Exam (1)
13	First aid	30	10	20				1							grade
14	Didactic	16							10				6	1	grade
15	Basics of economics	16	10				6	1							grade
16	Basics of the organization and the management in the health protection	16							10				6	1	grade
17	Demography	10							10					1	grade
18	Biostatistic	10	10					1							grade
19	Health promotion and education.	28							10	10			8	1	grade
20	Basics of the social and health policy and social insurance	12	12					1							grade
21	International aspects of public health	10							10					1	grade
22	Basics of the environmental protection*/ Basics of the environmental health*	20							10				10	1	grade

Recruitment: 2009 Non-stationary

Year I (2)

No	The subject	Number		seme	ster	I		ECTS		seme	ster	II		ECTS	Form
NO	The subject	of hours	L	С	A	S	SE	ECIS	L	С	Α	S	SE	ECIS	of credit
		Subje	cts of	genei	al e	duc	ation	!							
1	Physical education	20								20				1	grade
2	English*/ German*	56		20			8	1		20			8	1	grade
3	Information technologies	18								10			8	2	grade
4	Philosophy* / History of medicine*	18	10				8	1							grade
5	Ethics* / Logic *	18							10				8	1	grade
6	Protection of intellectual property	8	8					1							grade
7	Health and safety at work and ergonomics	8	8					1							grade
			Ма	in sub	jects	S									
1	Qualified first aid	60	10	10				1	10	30				4	Exam (2)
2	Emergency medical operations	100							30	70				5	grade
			App	rentic	eship	os									
1	Practice in the unit of the local State-Fire Brigade	80									80			2	grade
2	Fitness camp	40									40			1	grade
3	Practice in the hospital rescue department*/ Practice at the disposer of the Medical Rescue Teams*/ Board of admissions*	40			40			1							grade
	Total number of hours:	1084	257	129	40	0	57		181	195	120	0	85		
	Total number of hours per semester(year)/ECTS:			4	83			30			581			30	
	Number of exams:	6			4						2				

Industrial Safety – I semester 4h Library training - I semester 4h

L: lectures

C: classes

A: apprenticeships

S: seminars

SE: self education

Field: Medical emergency rescue Recruitment: 2009

Non-stationary

Year II

		Number		seme	ster	Ш				seme	ester	IV			Form of
No	The subject	of hours	L	С	A	S	SE	ECTS	L	С	A	S	SE	ECTS	credit
		Su	bjects	of ge	nera	ıl edi	ucatio	on							
1	Physical education	20		20				1							
2	English*/ German*	56		20			8	1		20			8	2	Exam (4)
				Basic	subj	ects									
1	Pharmacology	60	40	10			10	3							Exam (3)
2	Toxicology	50							30	20				2	Exam (4)
3	Basics of social communication*/ Basics of social insurance*	24							10	10		4		1	grade
4	Problems of social pathology * / Environmental microbiology*	24	14	10				1							grade
5	The swimming pool*/ The self-defence*	36		18				1		18				1	grade
				Main	subj	ects									
1	Emergency medicine	240	30	80			10	6	30	80			10	6	grade
2	Emergency medical operations	230	30	70		10	10	6	20	70		10	10	4	grade
3	Internal diseases	130	30	10		20	5	3	30	10		20	5	3	Exam (4)
4	Surgery	185	30	30		20	5	4	30	30		20	10	5	Exam (4)
5	Pediatrics	55							20	20		10	5	2	grade
6	Intensive care	60							20	30		10		2	grade
7	Obstetrics and the gynecology	50	30	20				2							exam
8	Diagnostic imaging in emergency medicine	30	16				14	1							grade
			Α	ppren	itice.	ships									
1	Practice in the hospital rescue department	80									80			1	grade
2	Practice at the disposer of the Medical Rescue Teams.	80									80			1	grade
3	Fitness camp	40			40			1							grade
	Total number of hours:	1440	220	288	40	50	62		190	308	160	74	48		
	Total number of hours per semester(year)/ECTS:			(660			30			780			30	
	Number of exams:	5			1						4				

Recruitment: 2009 Non-stationary

Year III

	ar III	Number		sem	ester	· V				seme	ster	· VI			Form of
No	The subject	of hours	L	C	A	S	SE	ECTS	L	С	A	S	SE	ECTS	credit
				Basic	subj	ects	<u> </u>								
1	Methodology of research	16	16					1							grade
2	Communication in the health protection*/ Old and new social threats *	30				24	6	2							grade
3	Marketing of healthcare services*/ Paliative care*	30										24	6	2	grade
4	Basics transplantation*/ Basis for laboratory diagnosis*	30				24	6	2							grade
5	Basics of the nourishment of the man*/ Basics of the health and epidemiological supervision *	30										24	6	2	grade
				Main	subj	ects									
1	Emergency medicine	160	30	50				5	30	50				6	Exam (6)
2	Emergency medical operations	180	20	40		10	5	4	20	60		20	5	7	Exam (6)
3	Methodology of the instruction of the first-aid and the qualified first-aid	45							30	10			5	2	grade
4	Medicine of disasters	60							40			20		3	grade
5	Paediatrics	35	20	10											Exam (5)
6	Neurology	30	20	10											Exam (5)
7	Traumatology of motor system.	100	30	10		10		2	30	10		10		3	Exam (6)
8	Intensive care	40	20	10		10		3							Exam (5)
9	Forensic medicine	30							20						grade
10	Psychiatry	30	20	10				1							grade
11	Neonatology	12				12		1				5		2	grade
12	Infectious diseases	12												2	grade
13	Transfusiology	12				12		1							grade
14	Cardiology	12				12		1							grade
15	Specialist medical rescue	30							20			10		1	grade
16	Bachelor's Seminar	60				20	10	2				20	10	2	grade
			Α	Apprei	ntice	ships									
1	Practice in the hospital rescue department	40			40			1							grade
	Total number of hours:	1024	176	140	40	139	27		190	130	0	150	32		
	Total number of hours per semester(year)/ECTS:				522			30			502			30	
	Number of exams:	3			3						0				

Description of individual course units:

Subjects of general education

١	ECTS credits
	0

Physical Education

2. Course contents

All the physical activities are offered to be for students at the gym, sports hall, fitness room and on the swimming pool. The students have the opportunities to choose their preferable form.

3. Prerequisites

There are not observed any bad impact on their health.

4. Learning outcomes

The aim of the course is to improve the physical activity of the students and their knowledge connected with practicing sports, especially sophisticated exercises. The subject has to have an impact on their physical education in this direction. It is crucial for them to get significant facilities, experience and also all the important skills during realizing such a broadminded course. It is significant in their future to reach all their aims in work to be as animators or the main organizers of the physical activities in their surrounding as the course contains all the important issues in the branch of physical education. Teaching how to relax, how to reach the essential discipline in different sports are not the only aspects of this vital course.

5. Recommended reading

None.

6. Type of course

Obligatory

7. Teaching team

Department of Recreation

8. Course structure

Form	Number of hours	Semester	Year
Lecture			
Classes	30/18	I	1
Laboratory			
Project			
Seminar			
Other			
Total student's workload	3018	I	1

9. Assessment methods:

Unrated credits (without a grade) based on attendance in class

10. Language of instruction:

ECTS credits	
0	

Physical Education

2. Course contents

All the physical activities are offered to be for students at the gym, sports hall, fitness room and on the swimming pool. The students have the opportunities to choose their preferable form.

3. Prerequisites

There are not observed any bad impact on their health.

4. Learning outcomes

The aim of the course is to improve the physical activity of the students and their knowledge connected with practicing sports, especially sophisticated exercises. The subject has to have an impact on their physical education in this direction. It is crucial for them to get significant facilities, experience and also all the important skills during realizing such a broadminded course. It is significant in their future to reach all their aims in work to be as animators or the main organizers of the physical activities in their surrounding as the course contains all the important issues in the branch of physical education. Teaching how to relax, how to reach the essential discipline in different sports are not the only aspects of this vital course.

5. Recommended reading

None.

6. Type of course

Obligatory

7. Teaching team

Department of Recreation

8. Course structure

Form	Number of hours	Semester	Year
Lecture			
Classes	30/18	II	1
Laboratory			
Project			
Seminar			
Other			
Total student's workload	30/18	II	1

9. Assessment methods:

Unrated credits (without a grade) based on attendance in class.

10. Language of instruction:

ECTS credits	
1	

The basics of economics

2. Course contents

Lecture

- 1. Introduction, structures of the economics. Microeconomics and macroeconomics.
- 2. Market economy, market and its structure. Demand and supply. The factors of demand and supply. Market price.
- 3. The fundamental theory of enterprise. Revenue and costs production and factors of productions.
- 4. Economic role of government. The rule of interventions in economy.
- 5. Creation and distribution of national income and his measurments.
- 6. Budget policy. Fiscal policy.
- 7. The role of money in the economy. The nature of central bank. Monetary policy.

3. Prerequisites

None

4. Learning outcomes

Students will be able to explain the mechanism of market economy and interpret the basics measures of economic welfare. This subject allows to understand the influence of economic problems on social and political life.

5. Recommended reading

- 1. Czarny B., Rapacki R., Podstawy ekonomii, Polskie Wydawnictwo Ekonomiczne, Warszawa 2002.
- 2. Milewski R. (red.,) Podstawy ekonomii, Wydawnictwo Naukowe PWN, Warszawa 2008.
- 3. Samuelson P. A., Nordhaus W. D., Ekonomia, tom I, II, PWN, Warszawa 2008.

6. Type of course

Obligatory

7. Teaching team

Department of Economics and Management

8. Course structure

Form	Number of hours	Semester	Year
Lecture	20/12	I	1
Classes			
Laboratory			
Project			
Seminar			
Other			
Total student's workload	30	I	1

9. Assessment methods

Credit with mark.

10. Language of instruction

ECTS Credits	
1	

Biostatistic

2. Course contents

Lecture

Elementary concepts in statistics. Measurement Scales. Statistical visualization techniques. Descriptive statistic: measures of central tendency, measures of dispersion. Basic concepts in probability theory: definitions of probability, random variable, discrete and continuous random variable, probability distributions, cumulative distributions function, expected value and variance of random variable. Normal distribution. Sampling distributions of the mean. Confidence interval for the mean. Significance testing, student's t-testing (unpaired and paired two-sample t-tests). Excel in data analysis. Chosen models and methods in biology and medicine.

3. Prerequisites

none

4. Learning outcomes

The students are familiar with the basic concepts, categories of descriptive and mathematical statistic and basic methods of data analysis. The students can understand the statistical analysis of data in medical research. They know how to describe data and how to use basic methods of mathematical statistics to solve chosen medical problems.

5. Recommended reading

- 1. Biostatystyka, Stanisz A. (red.) Wydawnictwo Uniwersytetu Jagiellońskiego, Kraków 2005
- 2. Petrie A., Sabin C., Statystyka medyczna w zarysie, Wydawnictwo lekarskie PZWL, Warszawa 2006
- 3. Bryła M.: Epidemiologia z elementami biostatyki. Wydawnictwo Uniwersytetu Jagiellońskiego, Kraków 2005

6. Type of course

Obligatory

7. Teaching team

Department of Accountancy, Finance and Quantitative Methods

8. Course structure

Form	Number of hours	Semester	year
Lecture	20/12	I	1
Classes	-		
Laboratory			
Project			
Seminar			
Other			
Total student's workload	30	I	1

9. Assessment methods

Credit with note.

10. Language of instruction

ECTS Credits
1

Demography

2. Course contents

Lecture

Elementary concepts in demography. Methods of demographic data collection. Demography in medicne research. Demografic situation and health status of population. Theories of Population Growth. Fertility and mortality transitions. Age and sex structure. Fertility and its determinants. Mortality and its determinants. Mortality and Fertility trends and natural increase. Demographic projections. Natural increase and health.

3. Prerequisites

none

4. Learning outcomes

The students are familiar with the basic concepts of demography, the main demographic events and structures. The students can search data about health of population. They can explain relations between demografic situation and health status of population.

5. Recommended reading

1. Holzer J., Demografia, Polskie Wydawnictwo Ekonomiczne, Warszawa 2003

- 2. Kędelski M.: Demografia, Akademia Ekonomiczna w Poznaniu, Poznań 2006
- 3. Okólski M.: Demografia: podstawowe pojęcia, procesy i teorie w encyklopedycznym zarysie., Wydawnictwo Naukowe Scholar, Warszawa 2006.

6. Type of course

Obligatory

7. Teaching team

Department of Accountancy, Finance and Quantitative Methods

8. Course structure

Form	Number of hours	Semester	Year
Lecture	20/12	I	1
Classes	-		
Laboratory			
Project			
Seminar			
Other			
Total student's workload	30	I	1

9. Assessment methods

Credit with note.

10. Language of instruction

ECTS credits	
1	

The health and safety at work and ergonomics.

2. Course contents

Lecture

Legal and organizational issues: nature and system of the health and safety at work, basic regulations of the HSW and the protection against fire. Obligations of the employer and employees within the scope of the HSW - the labour code and other legal documents; departmental regulations. Preventive care of employees – training in the HSW. Hazard assessment and occupational hazard with harmfulfactors and troublesome for the health, appearing in the process of practicing the profession of the medical lifeguard. Health and safety at work at using devices of the computing. Industrial diseases and their judgements. Causes of accident at work and the principles of procedure involving an accident. Individuals of the supervision and the control of working conditions. Chosen issues from the physiology of the work and the ergonomics: the role of the ergonomics in shaping working conditions and teachings, corrective, conceptual and system ergonomics. Methods of setting the energy expense. Classifications of the heaviness of the work. Ergonomic checklist.

3. Prerequisites

None.

4. Learning outcomes

The student knows:

- essential issues concerning nature of the health and safety at work, of system of the health and safety at work, of essential regulations of the HSW and the protection against fire,
- chosen issues from the physiology of the work and the ergonomics.

The Student understands:

• duties and laws of the employee and employers within the scope of the HSW.

The Student can:

- to identify the harmful factors to health, appearing in the operating environment,
- to use legal documents concerning the health and safety at work in practice,
- to take due intervention in case of threatening on a workstation,
- to organize a workstation according to requirements of regulations HSW,
- to judge the occupational hazard with harmful factors and troublesome for the health, appearing in the process of practicing the profession of the medical lifeguard.

5. Recommended reading

- 1. Górska E.: Ergonomia. Projektowanie, diagnoza, eksperymenty, OW PW, Warszawa 2007.
- 2. Wieczorek Z.: Bezpieczeństwo, higiena pracy i ergonomia w pracy biurowej, Wrocław 2007.
- 3. Raczkowski B.: BHP w praktyce. Ośrodek Doradztwa i Doskonalenia Kadr, Gdańsk 2005.
- 4. Wojciechowska-Piskorska H., Skuza L.: Bezpieczeństwo i higiena pracy w zakładach opieki zdrowotnej, Ośrodek Doradztwa i Doskonalenia Kadr, Gdańsk 2002.
- 5. Stec D.: Zasady BHP w praktyce, Wszechnica Podatkowa, Warszawa 2008.
- 6. Kodeks pracy, Wydawnictwo: Prawnicze LexisNexis, wrzesień 2008.
- 6. Type of course: Obligatory
- 7. Teaching team: Department of Medicine.

8. Course structure

Form	Number of hours	Semester	Year
Lecture	20/12	I	1
Classes			
Laboratory			
Project			
Seminar			
Other			
Total student's workload	30	I	1

9. Assessment methods

Credit with mark (written test).

10. Language of instruction

ECTS credits			
2			

Health promotion and education

2. Course contents

Lecture

Development of health promotion in Poland and abroad. Strategies, directions, priorities and targets for health promotion in the international arena. The basic documents related to the health promotion. International documents and health promotion organizations. Assumptions of the National Health Programme. Levels of health promotion and health prevention. Health promotion and health education in the healthcare system. Health determinants, health behaviour and factors affecting health. Objectives and tasks of health education, methodology and models of health education. Strategic planning for health education, chosen models of health promotion and health education. Sources of financing preventive education programs. The importance of communication in health education. Functions and qualifications of the medical rescuer in health promotion and health education.

Classes

Health problems of people of different age and conditions of health. Shaping the lifestyles determining health. The principles of health promotion and health education at all levels of the health care system. Constructing educational projects. Promoting healthy living patterns.

Self-improvement

Forming of lifestyles and health behaviours. Needs and barriers of educating the health education staff. Analysis of health education programs. Oncological education.

3. Prerequisites

Knowledge of biology, physiology, pathophysiology, psychology, public health.

4. Learning outcomes

The student knows the concept of health promotion and health education, programs and institutions promoting health, and development trends in Poland and worldwide. The student understands the relationship of health promotion and prevention. The student is able to use the methods of health education according to the needs of individuals, families, the environment.

5. Recommended reading

- 1. Andruszkiewicz A.: Promocja zdrowia i edukacja zdrowotna. Wyd. Czelej, Lublin 2008
- 2. Lwow F., Milewicz A.: Promocja zdrowia. Urban & Partner, Wrocław, 2004
- 3. Karski J.: Promocja zdrowia. PZWL, Warszawa, 2001
- 4. Karski J.: Praktyka i teoria promocji zdrowia. Wybrane zagadnienia. CeDeWu, Warszawa 2003
- 5. Borzucka Sitkiewicz K.: Promocja zdrowia i edukacja zdrowotna: przewodnik dla edukatorów zdrowia. Kraków, Oficyna Wydawnicza Impuls, 2006

6. Type of course

Obligatory

7. Teaching team

Department of Medicine

8. Course structure

Form	Number of hours	Semester	Year
Lecture	30/14	II	1
Classes			
Laboratory			
Project			
Seminar			
Other (Self-education)	10		
Total student's workload	60	II	1

9. Assessment methods

Credit with note.

10. Language of instruction

ECTS credits	
2	_

Information technologies

2. Course contents

Lecture

The history and the future of the information technology. The information technology around us. Elements of algorithms. Bases of computer techniques. The acquaintance of basic functions arranging the environment of the computer user, for purpose of the effective using of the computer. Rules of the classification of the software.

Application programs (Word, Excel, PowerPoint, Access). Telemedicine and the health. The electronic health care report. The internet in the medicine. Bibliographic bases: Medline, Core Biomedical Collection, Cancer.

Classes

The basic service of the operating system of the computer (Windows, Linux). The word processing, the use of the computer to the creation, editions, storages and the printing of documents. Spreadsheets, using of the computer to the leadership of repeatable calculations: preparations of budgets, workings out of prognoses, preparing of graphs and financial reports. Databases, the creation and the using of databases to the organization of large sources of data, making possible the quick and easy access to them. The graphics and presentations manager and Using of graphic techniques as the effective communication, widely used in the business and for the instructive purposes. The use of the computer at working out statistical data in medical sciences. The use of the equipment and the computer software in the medicine. Software in the medical service. The internet: basic services.

The creation of the own web page.

3. Prerequisites

None

4. Learning outcomes

Student can use chosen electronic processes for collecting, storing and making available information.

5. Recommended reading

Kowalczyk G., Word 2007 PL. Ćwiczenia praktyczne, Helion, 2007

Negrino T., Prezentacje w PowerPoint 2007 PL, Helion, 2008

Masłowski K., Excel 2007 PL. Ćwiczenia praktyczne, Helion, 2007

"Windows 2000/XP/Vista - dokumentacja systemu operacyjnego"

Mendrala D., Szelag M., Access 2007 PL. Ćwiczenia praktyczne, Helion, 2007

Jachimek S.: Komputer dla każdego. Wydawnictwo Helion, 2000.

6. Type of course

Obligatory.

7. Teaching team

Department of Informatics.

8. Course structure

Form	Number of hours	Semester	Year
Lecture			
Classes	30/18	II	1
Laboratory			
Project			
Seminar			
Other / Self education	0/12	II	1
Total student's workload	60	II	1

9. Assessment methods

Credit with note.

10. Language of instruction

ECTS credits	
1	

Protection of intellectual property

2. Course contents

<u>Lecture:</u> I. Subject area: I. Introduction: Intellectual goods as a special kind of goods. Position of intellectual rights regulation in a system of polish law. Genesis and meaning of international regulation of intellectual property law (Bern, Parisand common Conventions and other covenants with Poland as a party thereof) II. Copyright: Definition of original creative works and their kinds. Subjects f intellectual property rights. Content of intellectual property rights – persona land commercial intellectual property rights; exploitation fields. General rules of assignment of rights – succession of rights. Agreements assigning rights and licence agreements. Collective administration and protection of rights. Protection of rights. Related rights – subjects, content, usage and protection. Protection of databases. III. Industrial property rights: Objects of industrial property rights; Polish Patent Office. Subjects entitled to projects of patents. Content of right to patent Project regarding to persona land economic rights. General rules on protection of rights to industrial property objects.

3. Prerequisites

None

4. Learning outcomes

The goal of this seminar is to have each student understand the basic construction of intellectual property taking into account the differences between the intellectual property and copyright.

- 5. Recommended reading
- 1. J. Jezioro, Prawo własności intelektualnej (w:) Podstawy Prawa cywilnego pod red.: E. Gniewka, Warszawa 2010.
- 2. J. Barta, M. Czajkowska-Dąbrowska, Z. Ćwiąkalski, R. Markiewicz, E. Traple, Prawo autorskie i prawa pokrewne. Komentarz, Kraków 2005,
- 3. J. Barta R. Markiewicz, Ustawa o ochronie baz danych. Komentarz, Warszawa 2002,
- 4. Prawo autorskie i prawa pokrewne. Zarys wykładu (red. M. Poźniak-Niedzielska), Bydgoszcz-Warszawa-Lublin 2007.
- 5. R. Golat, Dobra niematerialne. Kompendium prawne, Warszawa 2005,
- 6. R. Golat, Prawo autorskie i prawa pokrewne, Warszawa 2005,
- 7. J. Barta, Markiewicz, Prawo autorskie, Warszawa 2008,
- 8. E. Nowińska, U. Promińska, M. du Vall, Prawo własności przemysłowej, Warszawa 2003,
- 9. Prawo własności przemysłowej (red. U. Promińska), Warszawa 2005,
- 10. System Prawa Prywatnego. Tom 13. Prawo autorskie (red. J. Barta), Warszawa 2007,
- 11. M. du Vall, Prawo patentowe, Warszawa 2008.

6. Type of course

Obligatory

7. Teaching team

Department of Sciences on Economics and European Union

8. Course structure

Form	Number of hours	Semester	Year
Lecture	20/12	I	1
Classes			
Laboratory			
Project			
Seminar			
Other			
Total student's workload	30	I	1

9. Assessment methods

Credit with mark (written test).

10. Language of instruction

Basic subjects

ECTS credits	
6	

Anatomy

2. Course contents

Lecture

The anatomical terminology; the structure of the axial and appendicular skeleton; the structure and mechanic of the bones; the skull; the structure and mechanic of the muscles (the typical places for intramuscularly injections), the basis of biomechanics; the structure of the pelvis wall (the mechanic of the parturition); the circulatory system – basal structure; the structure and topography of the hearth (localization of the electrodes in ECG); the vascular system (the typical places for intravenous injections); the respiratory system (the nursing and surgical methods of the facilitation of the respiration); the mediastinum; the pleura (the phenomenon of pneumothorax); the digestive system; the uro-genital system; the essential structure of the central and peripheral nervous system; the autonomic system; the sense organs – the general structure; the basal structure of the lymphatic system and endocrine glands.

Classes

The recognizing of the particular kinds of the bones and joints with using the sectional material; the structure of the cranial base and fossae on the models and x-ray images; the muscles of the limbs and trunk — demonstration of the functional groups (the places of occurring the hernias); the structure of the hearth (the valves and pericardial sac); the pleural cavity and mediastinum (the topographical relations on the models and X-rays photos); the peritoneal cavity; the intestinal and glandular part of the digestive system (on the models and using modern techniques of imaging -USG, CT, MRI); the demonstration of the external structure of the central nervous system; the meninges and meningeal spaces.

3. Prerequisites

Basic knowledge in the range of biology, physics and chemistry on the level of post gymnasium.

4. Learning outcomes

After completing the course of anatomy the student can describe particular anatomical structures and the locations and relationship of the organ in a living individual.

5. Recommended reading

- 1. "Anatomia człowieka podręcznik dla studentów" red. Witold Woźniak, Wydawnictwo Urban & Partner, Wrocław 2001
- 2. "Podstawy anatomii człowieka" : podręcznik dla studentów, Bogusław K. Gołąb, Wydaw. Lekarskie PZWL, Warszawa 2000
- 3. "Atlas anatomii człowieka" Johannes Sobotta, Wydawnictwo Urban & Partner, Wrocław 2001

6. Type of course

Obligatory.

7. Teaching team

Department of Medicine

8. Course structure

Form	Number of hours	Semester	Year
Lecture	40	I	1
Classes	20	I	1
Laboratory			
Project			
Seminar	16		
Other: self education	15		
Total student's workload	180	I	1

9. Assessment methods

Exam.

10. Language of instruction

ECTS credits	
1	

Biochemistry

2. Course contents

<u>Lecture</u>: Biochemical basics of organism integration – division, structure and functions for macromolecules. Nucleic acids (structure, chemical reactions, role). Construction role of amino acids, fats, saccharides, vitamins and proteins. Transformation of proteins: digestion, absorption, formation and role of biogenic amines, phenyloalanine transformation, synthesis of proteins. Transformation of carbohydrates: digestion, absorption, glicolysis, glicogenase, synthesis of lactose. Fats transformations: digestion, absorption, animal fats, composition and role of the bile in digestion, lipoproteins of plasma, synthesis of real fat and fatty acids. Energy supplying processes: Krebs' cycle, high energetic compounds, deflection chain. Biochemistry of tissues and organs. Alimentary canal – enzymes, stomach juice, bile, pancreas, liver, kidney. Basic-acidic equilibrium. Biochemical construction of bones. Enzymes and coenzymes. Influence of physical factors on the speed of enzymatic reactions. Hormones - construction, properties, acting mechanism and division. Control of hormonal metabolic changes. Vitamins and mineral compounds - their meaning in feeding.

<u>Laboratory</u>: Introduction: Biochemistry, molecular biology vs. organic chemistry. Regulations of laboratory and safety code. Blotting paper chromatography of amino acids. Quantitative methods of proteins determination. Enzymes detection. Determination of enzymes activity. Verification exercises: amino acids, peptides, proteins and enzymes. Properties and determination of nucleic acids. Properties and determination of saccharides. Quantitative methods of sugars determination. Determination of some chemical components of blood. Verification exercises: nucleic acids, sugars, lipids, and sterides; organ liquids (blood, urine).

3. Prerequisites

Basic knowledge in the range of biology, physics and chemistry on the level of post gymnasium.

4. Learning outcomes

Students are misunderstood with construction and functions of chemical compounds of men organ, as well as with biochemical processes in men organ. Students know how to explain and understand of cells, tissues and organs acting on the ground of biochemistry principles. Listeners can take advantage of recognized phenomenon connected with diagnostic and therapeutic methods in practical way. Students will be presenting posture of conscious person of her knowledge and willing into her practical application in clinical excercises.

5. Recommended reading

Murray R., Gardner D., Mayes P., Rodwell V., Harper's Biochemistry, Publishing House of PZWL, Warszawa 2008. Bankowski E., Biochemistry, Textbook for the Medical University Students, Publishing House of Urban & Partner, Wroclaw. 2004.

Koolman J., Rohm K. H., Biochemistry, Warszawa, Publishing House of PZWL, 2005.

Stryer L., Biochemistry, Scientific Publishing House of PWN, Warszawa, 2003.

Davidson V., Sittman D. (Editors), Biochemistry, Publishing House of Urban & Partner, Wroclaw, 2002.

6. Type of course

Obligatory

7. Teaching team

Division of Environmental Protection, Faculty of Administration, PWSZ Legnica

8. Course structure

Form	Number of hours	Semester	Year
Lecture	10	I	1
Classes			
Laboratory	10/6	I	1
Project			
Seminar			
Other			
Total student's workload	30	I	1

9. Assessment methods

Credit with note (lecture –written test, laboratory – passing).

10. Language of instruction

ECTS cred	dits
2	

Biology with elements of immunology and genetics

2. Course contents

Lecture

Basic genetics knowledge (Mendelism, genes and inheritance; inheritance of blood groups, sex; genetics of population, phenotype, genotype, karyotype). Molecular genetics (DNA, RNA types, replications, transcription, translation). Human genetic disorders (chromosome aberrations: structural and number abnormalities, epidemiology, diseases, etiology). Elements of immunology (structure of immunological system: cells, immunoglobulin's, cytokines, tissues and organs, physiology, diseases). Elements of cytology and histology (types of cells, organization of cells, tissues, organs; connective tissues, blood; muscles, bones, skin, digestive system, nervous system, respiratory system, cardiovascular system, urinary system)

Classes

Mitosis and meiosis. Somatic and germ cells. Congenital disorders. Methods of prenatal diagnosis. Genetic counselling. Indications to genetic testing. Methods of genetic testing. Rehabilitation of children with genetic disorders. Methods of molecular diagnosis. Ethical, legal and social aspects of genetics in medicine. Perspectives of development of clinical genetics. Biotechnology (DNA cloning, PCR, hybridization, enzymes). Basics of genetic engineering. Genetics in breeding of plants and animals. GMO's.Genetic and evolution factors in human populations. Impact of genes on human development.

3. Prerequisites

Biological knowledge from secondary school.

4. Learning outcomes

Knowledge of basics of histology (cell and tissue structure); knowledge of genetics (rules, disorders, genetic counseling); knowledge of immunology (structure, physiology)

5. Recommended reading

- 1) Jarygin W.: Biologia. Podręcznik dla studentów kierunków medycznych. Warszawa, Wydawnictwo Lekarskie PZWL, 2003.
- 2) Bradley J. T., Johnson D. R., Pober B. R., Genetyka medyczna, wyd. 1, Warszawa, Wydawnictwo Lekarskie PZWL, 2008.
- 3) Drewa G., Ferenc T. (red.), Podstawy genetyki dla studentów i lekarzy. Wydawnictwo Medyczne Urban & Partner. Wrocław 2003.
- 4) Roitt I., Brosthoff J., Male D.: Immunologia, Warszawa, Wydawnictwo Lekarskie PZWL, 2001.
- 5) Kawiak J., Zabel M.: Seminaria z cytofizjologii, Wrocław 2002.
- 6) Stevens A., lowe J.: Histologia, Warszawa, PWN 2000.
- 7) Ptak W., Ptak M., Szczepanie M.: Immunologia, Warszawa, Wydawnictwo Lekarskie PZWL, 2009.
- 8) Jorde L.B., Carem J.C., Bamshad M.J., White R.L., Genetyka medyczna. Czelej. Lublin 2003.

6. Type of course

Obligatory

7. Teaching team

Department of medicine.

8. Course structure

Form	Number of hours	Semester	Year
Lecture			
Classes			
Laboratory			
Project			
Seminar	30	I	1
Other			
Total student's workload	60	I	1

9. Assessment methods

Grade.

10. Language of instruction

ECTS credits	
1	

Biophysics

2. Course contents

Lecture and classes:

The role of biophysics in medical sciences. Basic biophysics terms: . Thermoregulation disorders. Fever and hypothermia. Endocrine system . Blood and hemopoetic system diseases. Circulatory system . Excretory system The biophysics of bones, joints and muscles. Central and peripheral nervous system . The special senses organs.

The new viewpoint was possible because of a series of new discoveries including the isolation of the electron X-rays, radioactivity. The concept of the electrical structure of matter. The introductions of the quantum theory by Planck und the theory of relativity by Einstein. EKG, CT, PET, MR, NMR, USG

3. Prerequisites

The knowledge of biophysical terms

4. Learning outcomes

The students are familiar with biophysical thinking of functional of human body . The students are used to correct medical thinking.

5. Recommended reading

- 1. Jaroszyk F. (red.): Biofizyka. Podręcznik dla studentów. Wyd. Lek. PZWL, Warszawa 2008r
- 2. Jóźwiak Z., Bartosz G., Biofizyka wybrane zagadnienia wraz z ć2. ćwiczeniami, wyd. 1, Warszawa, Wydawnictwo Naukowe PWN, 2005.
- 3. Miekisz S., Hendrich A. (red.): Wybrane zagadnienia z biofizyki. Volumed, Wrocław 1998.
- 4. Jarząbek W.: Biofizyka. Wydawnictwo SGGW, Warszawa 2005
- 5. Terlecki J.: Ćwiczenia laboratoryjne z biofizyki i fizyki. PZWL, Warszawa 1995.

6. Type of course

Obligatory

7. Teaching team

Department of Medicine.

8. Course structure

Form	Number of hours	Semester	Year
Lecture	16	I	1
Classes			
Laboratory			
Project			
Seminar			
Other			
Total student's workload	30	I	1

9. Assessment methods

Grade.

10. Language of instruction

ECTS credits	
1	

Didactic

2. Course contents

Lecture

Formation of pedagogy scientifically knowledge about education- general didactic in the synthetic historical perspective. Research object and general didactic tasks as a pedagogy subdiscipline. Main didactical systems – classical didactic, humanistic, alternative, technological. Contemporary school system. Aims of education – factual, dispositional, axiological and formal aspect. Content of education. Roles of selecting and organization of education contents. Process and rules of teaching and learning at school. Methods of teaching and learning – search and administration. Didactical means. Organizational forms of teaching and learning – school. Didactical measurement theory.

Classes

Aims of education – operational aspect. Programs of education. Didactical planning – directing, score, methodical. Process and rules of teaching and learning at school. Methods of teaching and learning . Didactical means. Control and evaluation in educational process.

3. Prerequisites

None

4. Learning outcomes

The students are familiar withbase of knowledge about education, in general didactic area and it differences in a scientifical, social, cultural contexts.

They are able to understand of facts, phenomenon's, process, regularity, functioning ruled of reality factors of education, didactical solution, teacher and school instrumentation.

They are able to self-reliant describing and analysis used in practice teacher and school instrumentation.

5. Recommended reading

- 1. Bereźnicki F.: Dydaktyka kształcenia ogólnego, Wyd. "Impuls", Kraków 2001.
- 2. Cohen L., Manion L., Morrison K.: Wprowadzenie do nauczania, Wyd. Zysk i S-ka, Kraków 1999, (R 14. Kierowanie klasą i kontrola nad nią, s. 325 390).
- 3. Niemierko B.: Kształcenie szkolne. Podręcznik skutecznej dydaktyki, Wydawnictwo Akademickie i Profesjonalne, Warszawa 2007.
- 4. Sztuka nauczania. Szkoła, pod red., K. Konarzewskiego, PWN, Warszawa 1991.

6. Type of course

Obligatory

7. Teaching team

Department of Pedagogy

8. Course structure

or course structure			
Form	Number of hours	Semester	Year
Lecture			
Classes			
Laboratory			
Project			
Seminar	16	II	1
Other			
Total student's workload	30	II	1

9. Assessment methods

Grade.

10. Language of instruction

ECTS Credits	
2	

First-aid

2. Course contents

Lecture and Classes

Basic concepts: first aid, aid qualified, medical rescue operations. Social groups to which it is addressed first aid. Safety - rescuer, victim, scene of the incident. First aid. The rules call for help. The diagnosis of a life threatening health condition – principles of assessment. Respiratory and cardiac arrest. Cardiopulmonary resuscitation. Resuscitation adult. Resuscitation child. Resuscitation of the baby. Choking adult, child, baby. The unconscious patient. First aid in selected life-threatening condition associated with the nervous, circulatory, respiratory.

3. Prerequisites

none

4. Learning outcomes

The student knows the basic principles of first aid, legal instruments governing the obligation to provide first aid. Students can ensure the safety of himself and injured during first aid, recognize the state of health of victim, provide adequate assistance to the identified health status base don available on site as possible, carry out the evacuation of injured from the danger zone, medical help. Student presents the attitude of a person conscious of his knowledge and eager to its practical applications for learning objects studied:

5. Recommended reading

- 1. ABC resuscytacji red. J. Jakubaszko. Wydawnictwo Górnicki. Wrocław 2006.
- 2. Adwenced LIFE SUPORT GROUP, Medycyna ratunkowa. Nagłe zagrożenia pochodzenia wewnętrznego. Górnicki Wydawnictwo Medyczne. Wrocław 2003
- 3. Ball C. M., Philips R.S., Medycyna stanów nagłych. WIG- Press. Warszawa 2002

6. Type of course

Obligatory

7. Teaching team

Department of ...

8. Course structure

o. Course structure			
Form	Number of hours	Semester	Year
Lecture	20	I	I
Classes	30	I	I
Laboratory			
Project			
Seminar			
Other			
Total student's workload	60	I	1

9. Assessment methods

Credit with mark. Lecture - written test, classes - written test are the conditions of ranking the classes

10. Language of instruction

ECTS credits
1

Hygiene and epidemiology.

2. Course contents

<u>Lectures and classes:</u>

Definition of epidemiology, basic concepts of epidemiology. Environment pollution, water, soil, air. The state of environment pollution in the Lower Silesia; noise, vibration. Epidemiology of the infectious and neoplasmatic diseases. The source of the infectious diseases. Epidemiological supervision, epidemiological investigation. Clinical infections. Hygiene in the hospital, in the nursery, primary and secondary school. Personal hygiene.

3. Prerequisites

Knowledge of microbiology, parasitology and public health

4. Learning outcomes

The student knows the basic concepts from the range of epidemiology, hygiene and both infectious and non-infectious diseases.

5. Recommended reading

Higiena (red. J.Karczewski) Wydaw. Czelej, Lublin 2002

Magdzik W., Naruszewicz-Lesiak D., Zieliński A: Choroby zakaźne, pasożytnicze – epidemiologia i profilaktyka.; Medica Press, Bielsko-Biała 2007

Jędrzejewski W.: Epidemiologia, Warszawa, PZWL 1986

6. Type of course

Obligatory

7. Teaching team

Department of Medicine

8. Course structure

Form	Number of hours	Semester	Year
Lecture	20	II	1
Classes	10	II	1
Laboratory			
Project			
Seminar			
Other			
Total student's workload	30	II	1

9. Assessment methods

Grade.

10. Language of instruction

ECTS credits	
3	

Microbiology and parasitology

2. Course contents

Lecture and classes

Physiology and morphology of bacteria, viruses, parasites and fungi. Infectiousness of viruses (HIV, WZW, HPV), bacteria (Salmonella, Escherichia coli, Pseudomonas aeruginosa, Mycobacterium tuberculosis), parasites (Toxoplasma gondii, trichomonas vaginalis, Entamoeba histolytica), fungi (Candida albicans). Sepsa, antibioticotherapy. Basic diagnostic methods (staining, serological tests). Acquirement of samples.

3. Prerequisites

None

4. Learning outcomes

The student is familiar with the basic ideas from the range of medical microbiology and diagnostic methods.

5. Recommended reading

- 1. Zaremba M., Borowski J.: Mikrobiologia lekarska.; Warszawa PZWL, 2003.
- 2. Buczek A.: Choroby pasożytnicze.; Liber, Lublin 2003.

6. Type of course

Obligatory

7. Teaching team

Department of Medicine

8. Course structure

Form	Number of hours	Semester	Year
Lecture	30	II	1
Classes	10	II	1
Laboratory			
Project			
Seminar			
Other			
Total student's workload	90	II	1

9. Assessment methods

Exam

10. Language of instruction

ECTS credits	
4	

Pathophysiology

2. Course contents

Lecture and classes:

The role of pathophysiology and pathomorphology in medical sciences. Basic pathologic terms: health, disease, death. Clinical death and biological death. The symptoms of death. Etiology and pathogenesis. The course of a disease. Classifications of diseases. The stages of ontogenesis. Biological aspects of senility. Effects of environmental (physical, chemical and biological) factors on pathogenesis. Iatrogenic pathogenic factors. Pathologic processes: circulatory disturbances, retrogressive changes, progressive changes, inflammations. Non-neoplasmal proliferations and neoplasms. Inflammation – etiopathogenesis, classification, corrective processes. Acute phase reaction. Thermoregulation disorders. Fever and hypothermia. The defensive mechanisms of the organism. Immunity, allergic reactions, autoimmunological diseases. Endocrine system pathology. Diabetes mellitus. Blood and hemopoietic system diseases. Circulatory system pathology. Shock. Respiratory system pathology. Alimentary tract, liver and the exocrine part of pancreas pathology. Jaundices. Excretory system pathology. The diseases of bones, joints and muscles. Central and peripheric nervous system pathology. Reproductive system disorders in females and males. Breast diseases. Skin pathology.

3. Prerequisites

The knowledge of human anatomy and physiology.

4. Learning outcomes

The students are familiar with morphologic and functional changes leading to diseases, during diseases and following diseases. The students are used to correct medical thinking.

5. Recommended reading

Kruś S.: Patologia. Podręcznik dla licencjackich studiów medycznych. Wyd. Lek. PZWL, Warszawa 2003.

Domagała W. (red.): Podstawy patologii. Podręcznik dla studiów medycznych. Wyd. Lek. PZWL, Warszawa 2008.

Maśliński S., Ryżewski J. (red.): Patofizjologia. Wyd. Lek. PZWL, Warszawa 2007.

Guzek J.W.: Patofizjologia człowieka w zarysie. Wyd. Lek. PZWL, Warszawa 2005.

O'Connor D.: Patologia. Wydawnictwo Urban & Partner, Wrocław 2007.

Stevens A., Lowe J.: Patologia. Czelej, Lublin 2005.

Kruś S., Skrzypek E.: Patomorfologia kliniczna. Wyd. Lek. PZWL, Warszawa 2006.

6. Type of course

Obligatory

7. Teaching team

Medical Faculty

8. Course structure

Form	Number of hours	Semester	Year
Lecture	40	II	1
Classes		II	1
Laboratory			
Project			
Seminar	20/0	II	1
Other			
Total student's workload	120	II	1

9. Assessment methods

Lecture – exam, classes – written tests are the conditions of ranking the classes

10. Language of instruction

ECTS credits	
3	

Pharmacology

2. Course contents

Lecture and classes:

<u>Lecture:</u> general pharmacology, drug information sources; drug dosage, calculation of drug doses for children; routes of drug administration and elimination; mechanisms of drug action; drug distribution and metabolism, unwanted effects of drugs, drug toxicity; antimicrobials; penicillins, cephalosporins; sulfonamides; aminoglycosides; tetracyklines; makrolides; linkozamides, glycopeptides, quinolones; antiprotozoal drugs, antifungals; antituberculous drugs, treatment regimens in tuberculosis; autonomic nervous system; parasympatykotonic drugs, parasympatykolytics, adrenergics, adrenolytics, sympatolytics, ganglioplegics; antiseptics and desinfectants, acids and bases, atomic oxygen, protein denaturation preparations; cardiovascular drugs, cardiac glycosides, dopaminergic drugs, phosphodiesterase inhibitors, calcium channel agonists and antagonists; antiarrhythmic drugs, pathomechanisms of acute and chronic heart attack and failure, nitrites and nitrates, nitroglycerin; nonsteroid antiinflammatory drugs; podział; mechanisms of action; COX1, COX2, glucocorticosteroids; analgesic narcotics.

Classes;

- a) the students prepare written short summary and oral presentation of three various clinical pharmacology cases concerning some drugs;
- b) the groups consisting of 3-4 students prepare an electronic media presentation on the following pharmacologic topics: drugs used in respiratory system diseases; psychotropic drugs; drugs used in the treatment of parkinsonism; drugs used in treatment of gastrointestinal tract diseases, drug therapy in various liver diseases; proton pump inhibitors, antacids, gastric ulcer pharmacotherapy; anxiolytic drugs, analeptics; antidepressive drugs, hypnotics.

3. Prerequisites:

None.

4. Learning outcomes:

The students are familiar with international drug terminology, pharmacokinetics and pharmacodynamics, use of drugs in adults, patients in advanced age, and in children, indications and contraindications in using drugs, potential drug interactions, drug side effects and toxicity, and also with rules of specific treatment obligatory in some drug intoxications. The students understand pathophysiological basis of drug use in clinical practice and in various diseases, help patients in use of prescribed drugs, inform about mechanism of specific drug actions and eventual unwanted drug effects or its toxicity, and introduce proper treatment, if necessary.

5. Recommended reading:

- 1. Rajtar-Cynke G.(red.). Farmakologia podręcznik dla studentów i absolwentów Wydziałów Pielęgniarstwa. Czelej, Lublin 2007.
- 2. Danysz A. Kompendium farmakologii i farmakoterapii. Urban & Partner, Wrocław 2002.
- 3. Prandota J. Podstawy farmakogenetyki i farmakogenomiki w praktyce klinicznej. Urban & Partner, Wrocław 2003.
- 4. Prandota J. Postępy pediatrii i farmakologii klinicznej. Wydawnictwo AM we Wrocławiu, 2009.

6. Type of course:

Obligatory

7. Teaching team:

Medical faculty

8. Course structure

Form	Number of hours	Semester	Year
Lecture	36	II	1
Classes	14	II	1
Laboratory			
Project			
Seminar			
Other/ Self education			
Total student's workload	90	II	1

9. Assessment methods

Lecture – examination, classes – written tests are the conditions of ranking the classes

10. Language of instruction

ECTS credits	
4	

Physiology

2. Course contents

Lecture and classes

Vital functions of human. Homeostasis. Neurohormonal regulation of physiological processes – the role of autonomous nervous system and endocrine glandules. Tissue hormones and growth factors. Thermoregulation. The composition and functions of blood. Hematopoesis. The microscopic images of blood and bone marrow. The functions of erythrocytes, leucocytes and thrombocytes. Blood transport of respiratory gases. The defensive mechanisms of the organism. Blood groups and histocompatibility antigens. Blood clotting and fibrinolysis. The examination of blood clotting. The electrical and mechanical activities of the heart. The elements of electrocardiography. Cardiac cycle. Heart sounds. The cardiovascular system activity: systemic and pulmonary circulation. The coronary circulation. The cardiovascular parameters (pulse, blood pressure, stroke volume, ejection fraction, cardiac output). The regulation of blood circulation. The respiratory system activity. The external and internal respiration. The elements of spirometry and gasometry. The alimentary tract activity. The digestion and intestinal absorption of alimentary components. Liver and pancreas functions. Kidney functions and urine excretion. The examination of kidney function. Fluid balance. Body fluids. The regulation of water and electrolyte balance. The regulation of acid and alkaline balance. The physiology of central and peripheric nervous system. The elements of electroencephalography. Reflexes. Sensation and perception. The sense of smell. The eye as an optical system. The examination of visual acuity and colored vision. Binocular and stereoscopic vision. Hearing and equilibrium. Sound conduction, conversion and perception. The sense of taste. The distribution of taste receptors. Cutaneous and deep sensibilities. The physiology of skeletal and smooth muscles. The regulation of posture, balance and movement. Higher nervous functions. The sleep. The physiology of reproduction - sex determination, spermatogenesis and oogenesis, ovarian and menstrual cycle. The physiology of pregnancy and delivery. Puerperium and lactation.

3. Prerequisites

Basic knowledge of biology, physics, chemistry and anatomy.

4. Learning outcomes

The students are familiar with the activities of nervous, endocrine, muscular, circulatory, respiratory, digestive, excretory, reproductive systems and blood and hematopoietic system functions. The students are able to measure basic physiological parameters.

5. Recommended reading

Traczyk W.Z.: Fizjologia człowieka w zarysie. Wyd. Lek. PZWL, Warszawa 2007

Borodulin-Nadzieja L.: Fizjologia człowieka. Podręcznik dla licencjatów medycznych. Górnicki Wydawnictwo Medyczne, Wrocław 2005.

Traczyk W.Z., Trzebski A.: Fizjologia człowieka z elementami fizjologii stosowanej i klinicznej. Wyd. Lek. PZWL, Warszawa 2007.

Ganong W.R., Wiliam R.: Fizjologia. Wyd. Lek. PZWL, Warszawa 2007.

Michajlik A., Ramotowski W.: Anatomia i fizjologia człowieka. PZWL, Warszawa 2007.

Bullock J., Boyle J., Wang M.B.: Fizjologia. Urban & Partner, Wrocław 2000.

6. Type of course

Obligatory

7. Teaching team

Medical Faculty

8. Course structure

Form	Number of hours	Semester	Year
Lecture	40	I	1
Classes	20/0	I	1
Laboratory			
Project			
Seminar			
Other / Self education			
Total student's workload	120	I	1

9. Assessment methods

Lecture – examination, classes – written tests are the conditions of ranking the classes

10. Language of instruction

ECTS credits	
1	

Propaedeutics of the law

2. Course contents

Lectures:

The law in the organization of the social life. The notion of the proposition of law and the legal provision. Sources of law. The procedure of the creation and resolving of legal acts. The internal structure of legal acts. The interpretation of the law: qualified organs to making of the interpretation of the law. The administration of justice. The labor law. Basic elements of the civil law. Basic notions and institutions of the civil law: the legal relationship, the natural person, the corporate body, the legal capacity, the capacity to act. General problems of civilian-legal contracts. Basic notions from the range of the public administration. Tasks and competences of organs of the government-administration within the range health protections: The Health Minister, the voivode, and the territorial autonomy: the autonomy communes, the district-autonomy , the autonomy of the province. Legal bases of the medical occupations. Rights and duties the paramedic occupation. The legal responsibility of the medical rescue worker: professional, penal, civilian. Organizational-legal forms of public and not public integrated health care management. The medical records- kinds and the range of the medical records , manners of her transformation. Legal forms of the paramedics occupation. The procedures of the civilian-legal contracts with National Fund of Health. Rights of the patient. International regulations. The legislation The Polish regulations of the patient rights.. The medical experiment and his conditionings.

3. Prerequisites

The basic knowledge from the range of humanities from the level of the secondary school.

4. Learning outcomes

The student knows the basic ideas of the law terminology, legal basis for performing the medical rescue occupation and the legal status of this professional group.

5. Recommended reading

1.Kulik, T.B., Latalski M.: The right {law} and the medicine., Czelej, Lublin 2002.

2. Nesterowicz M.: The medical law. Wyd. The house of the Organizer, Toruń 2005

Legal acts concerning talked over problems according to the current legal status, in this among other things the law about the State- medical Life-saving (Dz.U. with 2006r. No. 191, poz.1410 with późn. zm), orders Of The Health Minister from the day 29 December 2006 in the matter of the detailed range of medical rescue-acts which can be undertaken by the medical (Dz.U. No. 4, the item 33) rescuer, the order of The Health Minister from the day 21 December 2006 in the matter of kinds and the range of the medical records in works {bets} of the wholesome care and the manner of her transformation (Dz.U. 2006 No. 247 items 1819 with later changes).

6. Type of course

Obligatory

7. Teaching team

Department of Administration

8. Course structure

or course structure			
Form	Number of hours	Semester	Year
Lecture	16	II	1
Classes			
Laboratory			
Project			
Seminar			
Other			
Total student's workload	30	II	1

9. Assessment methods

Grade.

10. Language of instruction

ECTS credits
1

Psychology

2. Course contents

Lecture

Students get familiar with the run of psychical processes, their structure, basic processes, the functions they play in the regulation of human behavior. Within the framework of classes and lectures of general psychology they learn about cognitive processes (e.g. perception, learning, memory, thinking), decision making processes, emotions, motivation and some selected theories of personality. Also, it is essential to indicate to psychology having in common with many sciences as biology, physiology, medicine, social sciences, education, philosophy linguistics, etc. Moreover, it will be presented what is the contemporary approach to psychology pertaining to modern research explorations.

All processes, which are bound up with the various periods of life are treated developmentally. The result of the development is personality, defined as a self-regulating and self-controlling organization and structure. As a basic theoretical approach, modern development theories from philogenetic and ontogenetic perspective have been assumed, here.

The students will familiarize with some principal methods and tools of social psychologist work. They learn how to gather and interpret information collected from mini experiments they will carry out and describe limits of correct and grounded generalization onto wider social reality.

Selected subjects (curriculum)

The subject of general psychology, perception and experience creating mechanisms, perceptual categorization, attention, conditioning (both classical and instrumental), learning Beyond conditioning, memory, language, Communications, concepts, thinking, understanding, emotional intelligence, emotions, motivation, personality and various theories of, historical approach to the idea of childhood, theories of child development, sensorimotor development, social and emotional development, the problem how to influence other people, attitudes creations, adds and other issues of social sciences.

3. Prerequisites

None

4. Learning outcomes

Students are to acquire basic theoretical (lecture) and practical (classes) knowledge on social and personality psychology.

5. Recommended reading

Mietzel, Gerd, Wprowadzenie Do Psychologii, Gwd 2003

Strelau, Jan. Psychologia, Podręcznik Akademicki, Psychologia Ogólna, Gdw, Gdańsk 2000 R., Tom 2,

Vasta, R., Haith, M. M., Miller S. A. Psychologia Dziecka. Wsip, Warszawa 1995

Wosińska, W., Psychologia Życia Społecznego, Gwp, Gdańsk 2004.

Shapiro, L. W. Jak Wychowywać Dziecko Z Wysokim Eq. Pruszyński I S-Ka, Warszawa 1999 R. (Wybrane Zagadnienia).

6. Type of Course

Obligatory

7. Teaching team

Department of Education

8. Course structure:

Form	Number of hours	Semestr	Year
Lecture	20/16	I	1
Classes			
Laboratory			
Project			
Seminar			
Other/ Self education			
Total students' workload	30	Ι	1

9. Assessment methods

The credit with note. The assessment of students work will be done on the basis of semester theoretical and/or experimental written study on the selected problems of general psychology.

10. Language of instruction

ECTS credits	
2	

Public health

2. Course contents

Lectures:

Models of the health education - theoretical foundations and their realization in the idea of public health. The education in the health and in the illness. Basic notions differentiating public health and the social medicine. Basic notions: the health protection, the wholesome care , the wholesome culture , the health care, the preventive medicine, the environmental medicine , the social medicine and the public health. The idea of the health in the medicine and soft sciences: paradigms of the health, anthropological bases of the health, the health in the pedagogic, the sociology and the psychology. Medical and extramedical conditions of the health - cultural, social and economic. Wholesome programs within the range prophylaxises of dependences: the nicotine poisoning, the alcoholism, the drug habit, the pharmacomania, methods of the diagnostics of symptoms of dependences and the help to persons dependent on. The health care at school, within the framework of of the public health: the prophylaxis of events and traumata at school and in the environment, the prophylaxis of contagions with the virus HIV the activity and tilling of sport the rest active and passive, the skill of the advice to himself in difficult situations.

Exercises:

The public health - the participation of the society in his idea. Health behaviors, lifestyles and their relationship with the health. Chosen wholesome problems of the present world as a consequence environmental pollutions, the urbanization, civilizations, cultural changes , the lifestyle : diabetes, neoplasm, circulatory systems disorders, injuries and accidents, infectious diseases (eg. AIDS, hepatitis), mental illness. Factors of the risk of the arteriosclerosis: the arterial hypertension, smoking of the tobacco, the small physical activity, the obesity, the stress and the type of the individuality, the age and sex. Factors formative the state of health: social diseases disease epidemiology, factors of the risk of diseases of the circulatory system and neoplasmatic diseases. Ecological factors and the health.

3. Prerequisites

The knowledge of the base of physiologies, the microbiology and the parasitology, psychologies and the pedagogics.

4. Learning outcomes

The student knows: decisive factors about the health and the disease, the range and assignments of the public health, the influence of the working environment and the residence on the state of health, the influence of wholesome behaviours on the state of health, the meaning of the problems of the public health and the preventive medicine. The ideas of the health care over individuals, social groups, activities within the range of wholesome and social policy leading by the state.

The student knows: to recognize factors of the threat health staying in the working environment and residences, to diagnose factors conditioning the public health, to rate the state of health of the population on the ground given epidemiological and demographic, to recognize health dangers occurring in the environment of the residence, the learning and the work; to organize the work on the own position.

5. Recommended reading

Kulik T.B., Latalski M. (red.): Zdrowie Publiczne. Wydaw. Czelej Lublin 2005. Czupryna A. i wsp.: Zdrowie publiczne. Tom I i II. Vesalius, Kraków 2001.

6. Type of course

Obligatory.

7. Teaching team

Department of Medicine

8. Course structure

o. Course structure			
Form	Number of hours	Semester	Year
Lecture	14	I	1
Classes			
Laboratory			
Project			
Seminar	16	I	1
Other			
Total student's workload	60	I	1

9. Assessment methods: Grade

10. Language of instruction

ECTS credits	
1	

Sociology

2. Course contents

Lecture

Sociology as a science. Methods and techniques of the social research. Development of the sociological ideas. Inner diversity of the sociology. Current sociology. Natural, economical and cultural conditions of the social life. Human as a social being. Culture and its impact on the social life; the health culture. Social diversification, social inequality and social mobility in Poland. Family as a group and a social institution. Marriage and family in Poland, Europe and in the world. Pathologies in family life. Impact of disease on the family and social life. Sociology of the medicine. Cultural conditions of health and illness. Behaviours and attitudes in health and illness. Medical institutions. Social relation patient – medical personal. Dying and death as a social and cultural problem.

3. Prerequisites

General knowledge from the high school

4. Learning outcomes

The goal of the lecture is the presentation of different social communities, primarily showing the diversity of processes, which have an affect on their rising, functioning and evolution. The practical goal of the laboratory is the training of abilities useful by the building of ties in a social group, by the creation of workplaces, appearement of social tensions or solving of problems the modern communities have to deal with.

5. Recommended reading

Giddens A., Socjologia. Warszawa: Wn Pwn 2004.

Kubów A., Socjologia. Zarys Problematyki I Podstawowe Pojecia. Poznań: Forum Naukowe 2006.

Kawczyńska-Butrym Z., Taranowicz I., Majchrowska A., Wybrane Elementy Socjologii Dla Pielęgniarek. Lublin: Wydawnictwo Czelej 2000.

Majchrowska A., Wybrane Elementy Socjologii. Podręcznik Dla Studentów I Absolwentów Wydziałów Pielęgniarstwa I Nauk O Zdrowiu. Lublin: Wydawnictwo Czelej 2003.

Sztumski J., Wstęp Do Metod I Technik Badań Społecznych. Katowice: Śląsk 1999.

6. Type of course

Obligatory

7. Teaching team

Department of Sociology and Social Communication

8. Course structure

Form	Number of hours	Semester	year
Lecture	16	I	1
Classes			
Laboratory			
Project			
Seminar			
Other/ Self education	5	I	1
Total students' workload	30	Ι	1

9. Assessment methods

Credit with note

10. Language of instruction

ECTS credits	
3	

Toxicology

2. Course contents

Lecture

The definitions of poison and doses. The types, causes and structure of intoxications. The mechanisms of toxic action. Toxokinetics. The rules of acute intoxications' diagnostication. Toxicologic examinations. Specific and non-specific decontamination. The rules of management of acute intoxications – casual and symptomatic treatment, the acceleration of toxic substances' elimination, antidota.

Classes

The drug and subordinating substances intoxications. Food toxicology. Industrial toxicology. Environmental toxicology. Pesticides. The asphyxiating and irritant gases intoxications. Caustic toxins. Poisonous fungi. The poisons of plant and animal origin. The damaging action of ionizing radiation.

3. Prerequisites

Basic knowledge of pharmacology.

4. Learning outcomes

After completing the course the student knows the mechanisms of actions of toxic substances, symptoms of intoxications, the rules of managements in intoxications, the administration of antidota.

5. Recommended reading

- 1. Szajewski J.: Toksykologia dla nietoksykologów. Ostre zatrucia egzogenne. Medycyna Praktyczna, Kraków 2008.
- 2. Starek A.: Toksykologia narządowa. Wydawnictwo Lekarskie PZWL, Warszawa 2007.
- 3. Seńczuk W.: Toksykologia współczesna. Wydawnictwo Lekarskie PZWL, Warszawa 2005.

6. Type of course

Obligatory

7. Teaching team

Department of Medicine.

8. Course structure

Form	Number of hours	Semester	Year
Lecture	20	IV	2
Classes	20	IV	2
Laboratory			
Project			
Seminar			
Other: self-education	5	IV	2
Total student's workload	60	IV	2

9. Assessment methods

Grade.

10. Language of instruction

Main subjects

ECTS Credits	
6	

Emergency medical operations.

2. Course contents

Lecture and Classes

The diagnosis of a life threatening health condition - initial assessment and resuscitation - ABCDE elements of the preliminary examination. Monitoring: the minimum level of monitoring. Re-assessment - the rules of conduct. Interview - regimen PHRASED interview. Physical examination of the general and specific. Preliminary assessment state of the respiratory tract. Power breathing. Cardiovascular function. Evaluation of neurological status. Tests of higher mental activity. Additional studies in states of emergency - acid-base balance, recognition of cardiac arrhythmias, chest radiography, hematology, clinical chemistry. Pharmacotherapy in the emergency life. Electro therapy - cardioversion and defibrillation. Terms of transporting people in a life threatening condition - how safe patient positioning, handling techniques used and transport. Medical rescue operations in emergency origin of the external and internal. Medical rescue operations in the environmental hazards. Pulsoxymetry. Papillary reactivity assessment, assessment by the state of consciousness. GCS. Taking up and pursuit of basic and advanced cardiopulmonary resuscitation -Respiratory distress in adults and children, according to its standards. Instrumented to restore and protect airway using, in particular: tubing oropharyngeal, nasopharyngeal tube, facial masks, laryngeal masks, laryngeal tubes. Endotracheal intubation.

3. Prerequisites

None

4. Learning outcomes

Students are familiar with the basic concepts, categories, theories of medical rescue operations. They understand the basic relations and the relations between activities performed and the patient's condition. Students understand and interpret the most important morbidity, familiar elements of performing medical and basic procedures for deciding health and life of the patient. Student can formulate a diagnosis of rescue, perform medical rescue operations in accordance with established procedure, keep medical records in accordance with applicable law and work in a team, use the equipment in the emergency equipment kits, assess the basic vital signs and assessment of such injuries, interview saving, the preliminary examination and detailed perform cardiopulmonary resuscitation of adult, infant, newborn in special situations.

5. Recommended reading

- 1. ABC resuscytacji red. J. Jakubaszko. Wydawnictwo Górnicki. Wrocław 2006.
- 2. Advanced LIFE SUPORT GROUP, Medycyna ratunkowa. Nagłe zagrożenia pochodzenia wewnętrznego. Górnicki Wydawnictwo Medyczne. Wrocław 2003
- 3. Ball C. M., Philips R.S., Medycyna stanów nagłych. WIG- Press. Warszawa 2002
- 4. Brongel L. Duda K., Mnogie i wielonarządowe obrażenia ciała. PZWL Warszawa 2001
- 5. Cline D.M. Medycyna Ratunkowa (red. Jakubaszko). Urban & Partner. Wrocław 2003
- 6. Davies C., Bashir Y., Nagłe stany w kardiologii. Via Medica. Gdańsk 2002.

6. Type of course

Obligatory

7. Teaching team

Department of Medicine

8. Course structure

Form	Number of hours	Semester	Year
Lecture	30	II	1
Classes	50	II	1
Laboratory			
Project			
Seminar	20	II	1
Other / Self education	10	II	1
Total student's workload	180	II	1

9. Assessment methods

Credit with note.

10. Language of instruction

ECTS credits	
5	

Emergency medicine

2. Course contents

Lecture

History of emergency medical services; systems and standards of emergency medical services in other countries; models of emergency medical services; emergency medical system in Poland; organization of specialized emergency services; air medical rescue services; the tasks of medical rescue unit as a part of the rescue system in Poland, the capabilities and duties of the EMS personnel; medical rescue team at the accident site - the tasks and objectives; principles of rescuer and patient safety at site; assessment of the patient; the formulation of emergency diagnosis; standard equipment of medical rescue teams; medical equipment - principles of the use, disinfection, equipment readiness maintenance rules; functioning and organization of critically ill patient transportation; emergency department - the organization and functioning; current guidelines for cardiopulmonary resuscitation

Classes

Safety assessment at the site; basic procedures and algorithms in patients presenting: dyspnoea, shock, chest pain, headache, abdominal pain, disturbances of consciousness, fainting, drug overdose, cardiovascular and thermoregulation disorders, rashes; patient assessment at the scene; general algorithms in trauma life support; shock: diagnosis and treatment

Seminars

Safety assessment at the site; communication with the emergency EMS-police-fire command centre; emergency management plan; hospital: structure, organization and functioning; organization and functioning of the emergency department; standard equipment of medical rescue teams; general algorithms in trauma life support

3. Prerequisites

Having a knowledge of anatomy, physiology, pathophysiology, first aid, qualified first aid and pharmacology.

4. Learning outcomes

The student compares the performance standards of medical emergency services in Poland and abroad, presents the capabilities and duties of the medical rescuer, explains and demonstrates the principles for the assessment of the scene and ensuring the safety; lists principles for the preparation and maintenance of medical equipment, explains the structure and tasks of the emergency department, compares and demonstrates the guidelines for cardiopulmonary resuscitation

5. Recommended reading

- 1. Polska Rada Resuscytacji: Wytyczne resuscytacji krążeniowo-oddechowej ERC 2010, Kraków 2011
- 2. Jakubaszko J.: Medycyna ratunkowa. Nagłe zagrożenia pochodzenia wewnętrznego. Wydawnictwo Medyczne Górnicki, Wrocław 2003
- 3. Pousada L., Osborn H., Levy D.: Medycyna ratunkowa. Urban&Partner, Wrocław 2009.
- 4. Zawadzki A.: Medycyna ratunkowa i katastrof: podręcznik dla studentów uczelni medycznych. Wydawnictwo Lekarskie PZWL, Warszawa 2007

6. Type of course

Obligatory.

7. Teaching team

Department of Medicine

8. Course structure

Form	Number of hours	Semester	Year
Lecture	30	III	2
Classes	60/50	III	2
Laboratory			
Project			
Seminar	20/0	III	2
Other / Self education	10/0	III	2
Total student's workload	150	III	2

9. Assessment methods

Credit/grade

10. Language of instruction

ECTS credits	
5	

Emergency medicine

2. Course contents

Lecture

The work-related risk to medical rescuer; medical rescuer protection rules against infection; functioning standards in emergency department; emergency department as a workplace for medical rescuer; trauma emergencies; general ATLS algorithm in trauma patients; rules for evaluating the trauma patient; injury kinetics;

hypovolaemic shock; injuries of head, thorax, abdomen, spine, spinal cord and extremities - diagnosis and treatment; airway patency disorders - diagnosis and treatment; basic laboratory tests in the emergency department; the initial treatment in hemorrhagic shock; crystalloids and colloids, blood products - general characteristics, indications, available products; injury severity scales; algorithms un multiple injuries

Classes

assessment of the patient during prehospital phase and in the emergency department; algorithms for evaluating the trauma patients; formulating a medical rescue plan; injury kinetics assessment; algorithms for hypovolaemic shock patients; head injuries, chest injuries, abdomen injuries, spine and spinal cord injuries, extremities injuries; methods of securing the airway; injury severity scales; a practical assessment of the severity and extent of injuries; analysis of laboratory tests; intravenous access

Seminars

medical records; injury severity scales; evaluation of the kinetics of trauma; fluid resuscitation; crystalloids and colloids; blood products; the review of medical records; violence at the scene - diagnosis and dealing with; rules for rescuer protection against infection;

3. Prerequisites

Having a knowledge of anatomy, physiology, pathophysiology, first aid, qualified first aid and pharmacology.

4. Learning outcomes

The student analyzes the work-related risk for medical rescuer and explains the principles of protection against infection; the student explains and demonstrates the algorithms for trauma patients in accordance with the BTLS and ATLS guidelines, interprets the results of basic laboratory tests; explains and demonstrates the principles of patient assessment and formulates a rescue plan; the student identifies the symptomatology of trauma and non-trauma emergencies and demonstrates the appropriate medical algorithms for prehospital and in-hospital phases

5. Recommended reading

- 1. Jakubaszko J., Ratownik medyczny, wyd. 1, Wrocław, Górnicki Wydawnictwo Medyczne, 2007.
- 2. Jakubaszko J.: Medycyna ratunkowa. Nagłe zagrożenia pochodzenia wewnętrznego. Wydawnictwo Medyczne Górnicki, Wrocław 2003
- 3. Pousada L., Osborn H., Levy D.: Medycyna ratunkowa. Urban&Partner, Wrocław 2009.
- 4. Zawadzki A.: Medycyna ratunkowa i katastrof: podręcznik dla studentów uczelni medycznych. Wydawnictwo Lekarskie PZWL, Warszawa 2007

6. Type of course

Obligatory.

7. Teaching team

Department of Medicine

8. Course structure

Form	Number of hours	Semester	Year
Lecture	30	IV	2
Classes	60/50	IV	2
Laboratory			
Project			
Seminar	20/0	IV	2
Other / Self education	10/0	IV	2
Total student's workload	150	IV	2

9. Assessment methods

Credit/grade

10. Language of instruction

ECTS credits	
5	

Emergency medicine

2. Course contents

Lecture

Non-trauma emergencies; algorithms in non-trauma emergencies - a preliminary assessment and a secondary survey; emergency procedures, re-evaluation of the patient, in-hospital treatment; diagnosis and treatment in non-trauma emergencies: respiratory, circulatory, nervous, excretory, endocrine emergencies, poisoning, infections, organ failure; emergency medicine in children and in the elderly - diagnostic procedures and diversity; clearing and securing the airways; oxygen therapy, pulseoximetry, typical life-threatening cardiac arrhythmias

Classes

In-hospital and out-hospital cardiopulmonary resuscitation; postresuscitation care; algorithms for ventricular fibrillation and pulseless ventricular tachycardia and non-shockable rhythms; cardiovascular emergencies; pulmonary emergencies; haematology emergencies; emergencies in metabolic, renal, neurological disorders, allergies; ophthalmology and ENT emergencies; clearing and maintaining the airway patency; oxygen therapy; ECG monitoring; pulse oximetry

In-hospital and out-hospital cardiopulmonary resuscitation; resuscitation in special circumstances, ethic problems and family support during CPR; algorithms in non-trauma emergencies; recognition of life-threatening arrhythmias; acid-base balance emergencies

3. Prerequisites

Having a knowledge of anatomy, physiology, pathophysiology, first aid, qualified first aid and pharmacology.

4. Learning outcomes

Student analyzes and interprets the symptoms in patients presenting dyspnoea, shock, impaired consciousness, intoxication; the student explains and demonstrates basic and advanced life support in accordance with current guidelines; the student compares the symptomatology of non-trauma emergencies and demonstrates the algorithms for prehospital and in-hospital phases

5. Recommended reading

- 1. Jakubaszko J., Ratownik medyczny, wyd. 1, Wrocław, Górnicki Wydawnictwo Medyczne, 2007.
- 2. Jakubaszko J.: Medycyna ratunkowa. Nagłe zagrożenia pochodzenia wewnętrznego. Wydawnictwo Medyczne Górnicki, Wrocław 2003
- 3. Pousada L., Osborn H., Levy D.: Medycyna ratunkowa. Urban&Partner, Wrocław 2009.
- 4. Zawadzki A.: Medycyna ratunkowa i katastrof: podręcznik dla studentów uczelni medycznych. Wydawnictwo Lekarskie PZWL, Warszawa 2007

6. Type of course

Obligatory.

7. Teaching team

Department of Medicine

8. Course structure

Form	Number of hours	Semester	Year
Lecture	30	V	3
Classes	60/50	V	3
Laboratory			
Project			
Seminar			
Other / Self education	20/0	V	3
Total student's workload	150	V	3

9. Assessment methods

Credit/grade

10. Language of instruction

ECTS credits	
6	

Emergency medicine

2. Course contents

Lecture

Medical rescue procedures for mass casualties incidents; medical triage in adults and children; environmental emergencies - hypothermia and hyperthermia, frostbite and burns, drowning and near-drowning, altitude sickness, dysbaric disorders; coordination of search and rescue operations; emergency plans for disasters; basics of specialised rescue operations; psychiatric emergencies; dermatologic emergencies; hazardous materials incidents – chemicals, addictive substances, poisonings

Classes

analysis of clinical cases; patients in sudden life-threatening emergencies - diagnosis and treatment; transportation of critically ill patient; positioning the critically ill patients; communication equipment; medical equipment used by emergency medical teams; securing the accident scene and victims; medical triage; decontamination during rescue operations; algorithms for trauma, non-trauma and cardiac arrest patients

Seminars

principles of cooperation with other emergency and rescue services; medical support for mass gathering events; bioterrorism; hyperbaric treatment; analysis of disaster management plans; algorithms for snakes, insects and arachnids stings and bites; algorithms for rescue operations in chemical disasters

3. Prerequisites

Having a knowledge of anatomy, physiology, pathophysiology, first aid, qualified first aid and pharmacology.

4. Learning outcomes

The student explains and recognizes occupational hazards for medical rescuer and demonstrates the principles of protection against infection; the student explains and demonstrates the algorithms for trauma patients in accordance with the BTLS and ATLS guidelines, analyzes and interprets the results of basic laboratory tests; explains and demonstrates the principles of patient assessment and formulates a medical rescue plan for emergency; the student describes the symptomatology of trauma-related emergencies and demonstrates the algorithms for prehospital and inhospital phase; the student demonstrates the rules for adult and children medical triage, explains the principles of cooperation with other emergency services, presents algorithms for environmental emergencies, analyzes and compares the medical support plans for mass gathering events and emergency plans for disasters

5. Recommended reading

- 1. Jakubaszko J.: Medycyna ratunkowa. Nagłe zagrożenia pochodzenia wewnętrznego. Wydawnictwo Medyczne Górnicki, Wrocław 2003
- 2. Pousada L., Osborn H., Levy D.: Medycyna ratunkowa. Urban&Partner, Wrocław 2009.
- 3. Zawadzki A.: Medycyna ratunkowa i katastrof: podręcznik dla studentów uczelni medycznych. Wydawnictwo Lekarskie PZWL, Warszawa 2007
- 4. Ciećkiewicz J. (red.): Ratownictwo medyczne w wypadkach masowych. Medycyna katastrof w zarysie. Wydawnictwo Medyczne Górnicki, Wrocław 2005

6. Type of course

Obligatory.

7. Teaching team

Department of Medicine

8. Course structure

Form	Number of hours	Semester	Year
Lecture	30	VI	3
Classes	60/50	VI	3
Laboratory			
Project			
Seminar			
Other / Self education	20/0	VI	3
Total student's workload	180	VI	3

9. Assessment methods

Exam.

10. Language of instruction

ECTS credits	
2	

Intensive care

2. Course contents

Lecture

The history of anaesthesiology and intensive care; preoperative evaluation of the patient; general anaesthesia; the risk of general anaesthesia; induction and maintaining of general anaesthesia; patient monitoring; pharmacology of drugs used in anaesthesiology and intensive care; endotracheal intubation: indications, complications, equipment selection; preparation for general, local and regional anaesthesia; local anaesthetics; basics of intensive care; indications for admission to the ICU; monitoring of the ICU patients; acute respiratory failure; respiratory support - oxygen therapy, intubation, methods to improve the blood oxidation - ventilation monitoring

Classes

Preparation for anaesthesia; ASA scale; anaesthesiology equipment; monitoring in anaesthesiology; safety during anaesthesia and in postoperative period; general, regional and local anaesthesia; anaesthesiology equipment preparation, equipment to protect the airway, endotracheal intubation, the structure and organization of intensive care unit; intensive care in patients with life threatening emergencies; analysis of clinical cases and medical records

Seminars

drugs used in anaesthesiology and intensive care; ventilators - types, construction, operation; tracheotomy; mechanical ventilation, assisted ventilation, controlled ventilation, monitoring of patient ventilation; analysis of clinical cases, the documentation in the ICU

3. Prerequisites

Having a knowledge of anatomy, physiology, pathophysiology, pharmacology, internal medicine and surgery

4. Learning outcomes

After completing the course the student explains the principles of preparation for anaesthesia, rules in general and regional anaesthesia, compares the specificity of medical activities in the ICU and emergency department, explains the rules for eligibility of patients for treatment in the ICU, rules for patient monitoring; lists the basic drugs used in anaesthesiology and intensive therapy; the student interprets the fundamental problems reported during patient monitoring in intensive care, explains and demonstrates the methods of clearing the airway and patient ventilation

5. Recommended reading

- 1. Flake F., Lutomsky B., Leki w medycynie ratunkowej i intensywnej terapii, wyd. 1, Wrocław, Urban & Partner, 2011
- 2. Gaszyński W., Intensywna terapia i wybrane zagadnienia medycyny ratunkowej, wyd. 1, Warszawa, Wydawnictwo Lekarskie PZWL, 2008
- 3. Kamiński B., Kübler A. (red.): Anestezjologia i intensywna terapia. Wyd. Lek. PZWL, Warszawa 2007.
- 4. Singer M. i inni: ABC intensywnej terapii. Górnicki Wydawnictwo Medyczne, Wrocław 2004.
- 5. Wołowicka L., Dyk D., Anestezjologia i intensywna opieka. Klinika i pielęgniarstwo, wyd. 1, Warszawa, Wydawnictwo Lekarskie PZWL, 2008

6. Type of course

Obligatory.

7. Teaching team

Department of Medicine

8. Course structure

Form	Number of hours	Semester	Year
Lecture	20	IV	2
Classes	10	IV	2
Laboratory			
Project			
Seminar	10	IV	2
Other / Self education			
Total student's workload	60	IV	2

9. Assessment methods

Credit/grade

10. Language of instruction

ECTS credits	
3	

Intensive care

2. Course contents

Lecture

Assessing and supporting the cardiovascular system; acute heart failure - diagnosis and treatment options; standards of care in unconscious patient, coma; shock - classification, causes, treatment; hypovolaemic shock, cardiogenic shock, septic/neurogenic shock; sepsis - causes, diagnosis and treatment; renal failure - causes, diagnosis and treatment; cannulation of blood vessels

Classes

intensive care and treatment in life-threatening emergencies; monitoring in intensive care; respiratory failure; pulmonary embolism; heart failure; shock; algorithms in fluid resuscitation; renal failure; liver failure, infections emergencies; acute CNS injury; neuromuscular diseases; drug poisoning; burns; algorithms and procedures in: acute respiratory and circulatory failure, haemodialysed patients, procedures and standards of care in patients with established vascular access; enteral and parenteral nutrition; care in patients in the perioperative period, fluid balance; airway clearing and suctioning; CVP monitoring

Seminars

monitoring in the ICU; nutrition in intensive care; complications of tracheotomy and endotracheal intubation; treatment of acute and chronic pain; prevention of infections in the ICU; Glasgow coma scale

3. Prerequisites

Having a knowledge of anatomy, physiology, pathophysiology, pharmacology, internal medicine and surgery

4. Learning outcomes

After graduation, the student explains the algorithms and methods of treatment in life-threatening emergencies, methods of general and regional anaesthesia; student explains the desirability of general/regional anaesthesia; the student demonstrates basic life-saving procedures; student defines and demonstrates the basic diagnostic procedures, treatment and care in the intensive care unit, the student can prepare a care plan for emergency patients, explains and demonstrate how to use the medical equipment in the ICU; recognizes and interprets the basic medical emergency problems in the ICU patients

5. Recommended reading

- 1. Flake F., Lutomsky B., Leki w medycynie ratunkowej i intensywnej terapii, wyd. 1, Wrocław, Urban & Partner, 2011
- 2. Gaszyński W., Intensywna terapia i wybrane zagadnienia medycyny ratunkowej, wyd. 1, Warszawa, Wydawnictwo Lekarskie PZWL, 2008
- 3. Kamiński B., Kübler A. (red.): Anestezjologia i intensywna terapia. Wyd. Lek. PZWL, Warszawa 2007.
- 4. Singer M. i inni: ABC intensywnej terapii. Górnicki Wydawnictwo Medyczne, Wrocław 2004.
- 5. Wołowicka L., Dyk D., Anestezjologia i intensywna opieka. Klinika i pielęgniarstwo, wyd. 1, Warszawa, Wydawnictwo Lekarskie PZWL, 2008

6. Type of course

Obligatory.

7. Teaching team

Department of Medicine

8. Course structure

Form	Number of hours	Semester	Year
Lecture	20	V	3
Classes	10	V	3
Laboratory			
Project			
Seminar	10	V	3
Other / Self education			
Total student's workload	90	V	3

9. Assessment methods

Exam

10. Language of instruction

ECTS credits	
4	

Obstetrics and gynecology

2. Course contents

Lecture and seminar

Physiology and pathology of adolescence, procreation, pregnancy, climacterium and menopause; puberty gynecology, birth control, contraception, infertility, physiological and pathological gestation diagnostics, high risk pregnancy – causes, symptoms, diagnosis, treatment; multiple pregnancy, gestational bleeding; newborn (health state estimate of newborn right after post partum, full-term newborn, low birth weight newborn, post-mature newborn); gynecology exam and anamnesis, physiology and pathology of menstrual cycle, diagnostic exam in gynecology, neoplastic and inflammatory diseases of reproductive system and mamma, observation and nursing of newborn born at term and premature newborn, communication and thermal trauma, rules of pregnant women transport, precipitate labor, preparation of pregnant woman for caesarean section, mother and newborn the most common causes of threatening of life, sexual criminals

Classes

Physiological labor – mechanism of labor, observation of woman in labor, life functions monitoring – pregnant woman and fetus, care of newborn – practice with phantoms, caesarean section – instructions, preparation of pregnant woman for caesarean section, physiological and pathological puerperium, puerperal eclampsia, thromboangiitis, pathological labor, manual assistance, rules of woman in labor observation, precipitate labor – rescuers procedures, basic and professional procedures of pregnant woman resuscitation

3. Prerequisites

Basic knowledge in the range of anatomy, physiology and pathology

4. Learning outcomes

After completing the course student has basic obstetric and gynecologic knowledge due to physiology and pathology of woman's life, pregnant woman, woman in labor, woman in puerperium, woman with gynecologic diseases, newborn in first days of its life and urgent states requiring rescuers interventions. Student knows rules of pregnant women transport and precipitate labor procedures.

5. Recommended reading

- 1.Bręborowicz G., Położnictwo i ginekologia, T.1-2, wyd. 1, Warszawa, Wydawnictwo Lekarskie PZWL, 2008.
- 2. Opala T., Ginekologia. Wydawnictwo Lekarskie PZWL, Warszawa 2006.
- 3. Chazan B., Laibschang J.: Postępowanie w nagłych stanach położniczych i ginekologicznych. PZWL, Warszawa, 2001.
- 4. Troszyński M. Ćwiczenia położnicze. PZWL. 2008
- 5. Kruszyński Z.: Anestezjologia położnicza. Położnicze stany naglące. PZWL, Warszawa, 2007

6. Type of course

Obligatory

7. Teaching team

Department of Medicine

8. Course structure

Form	Number of hours	Semester	Year
Lecture	30	III	2
Classes	20	III	2
Practice studies			
Professional practice			
Seminar			
Self-education			
Total student's workload	120	III	2

9. Assessment methods

Exam

10. Language of instruction

ECTS Credits	
2	

Pediatry

2. Course contents

Lecture

Terms of psychosocial development of children and young people. Diseases of the alimentary system. Most frequent otolaryngological diseases. Respiratory disorders. Uropathies. Most often appearing diseases of the hematopoietic and the circulation systems. The detection of symptoms of maltreatments syndrome of the child -criteria of the risk, symptoms, the help to maltreated children.

Classes

The estimation of the children psychomotor development. The early diagnostics of disturbances of the somatic development. Rules of the correct nourishment of prematurely born children and babies. Infectious diseases of the childish age; the prophylaxis. The prophylaxis and clinical importance of upper respiratory.

3. Prerequisites

The basic knowledge of anatomy, physiology, pathologies.

4. Learning outcomes

The student knows: most frequent wholesome problems of the population aged to of development and fundamentals of the diagnostics, cares and the prophylaxis.

5. Recommended reading

- 1. Muscari M.E., Pediatria i pielęgniarstwo pediatryczne. Czelej. Lublin 2005
- 2.Rakowska-Róziewicz D. (red.), Wybrane standardy i procedury w pielęgniarstwie pediatrycznym. Lublin 2001.
- 3. Pawlaczyk B. (red.), Zarys pediatrii. Podręcznik dla studiów medycznych. PZWL. Warszawa 2006.
- 4.Barczykowska E.,, Ślusarz R., Szewczyk M. T., Pielęgniarstwo w pediatrii, wyd. 1, Warszawa, Borgis, 2006.

6. Type of course

Obligatory.

7. Teaching team

Department of Medicine

8. Course structure

Form	Number of hours	Semester	Year
Lecture	20	IV	2
Classes	10	IV	2
Seminar	10	IV	2
Other:			
Total student's workload	60	IV	2

9. Assessment methods

Grade

10. Language of instruction

ECTS Credits	
2	

Pediatry

2. Course contents

Lecture

Chosen disturbations of the endocrine system. The rachitis - reason, pathogenesis, symptoms, and the course. The emergency situations in the pediatry and diseases of the nervous system. Conditions of the traumaticness among children and young peoples and rules of the prophylaxis against the product resultant. The prevention and antisepsis of hospital in paediatric departments.

Classes

The part of preventive vaccinations of children and young peoples. The care of children in illnesses of the respiratory system. The care of unconscious child. The child with the brain-childish shock

3. Prerequisites

The basic knowledge of anatomy, physiology, pathologies.

4. Learning outcomes

The student knows: most frequent wholesome problems of the population aged to of development and fundamentals of the diagnostics, cares and the prophylaxis.

The student understands: the meaning of the observation of the development of the somatic and psychical child in each development periods and the need of the proper communication with the child in the different age and health.

5. Recommended reading

- 1. Muscari M.E., Pediatria i pielęgniarstwo pediatryczne. Czelej. Lublin 2005
- 2.Rakowska-Róziewicz D. (red.), Wybrane standardy i procedury w pielęgniarstwie pediatrycznym. Lublin 2001.
- 3. Pawlaczyk B. (red.), Zarys pediatrii. Podręcznik dla studiów medycznych. PZWL. Warszawa 2006.
- 4.Barczykowska E.,, Ślusarz R., Szewczyk M. T., Pielęgniarstwo w pediatrii, wyd. 1, Warszawa, Borgis, 2006.

6. Type of course

Obligatory.

7. Teaching team

Department of Medicine

8. Course structure

Form	Number of hours	Semester	Year
Lecture	20	V	3
Classes	10	V	3
Seminar	10	V	3
Other:			
Total student's workload	60	V	3

9. Assessment methods

Evam

10. Language of instruction

ECTS credits	
4	

Qualified first aid.

2. Course contents

Lecture and Classes

Safe use of oxygen under various conditions. Techniques of administration of oxygen. Interview emergency. Effect of the accuracy of testing the effectiveness of the provision of qualified first aid. The preliminary survey by the victim, detailed scrutiny. The victim unconscious. Resuscitation of adult, child, baby, baby in special situations. Terms injured by semi-automatic defibrillation and automatic. Shock. Emergency procedures in selected states of emergencies: seizures, diabetes, myocardial infarction, stroke, poisoning, flooding. Traumas and injuries, fractures, dislocations, sprains, bleeding, chest injuries, abdominal, spine, head and limbs

3. Learning outcomes

The Student has the knowledge and skills in first aid at the advanced level in all states of life-threatening internal and environmental origin. Student has a sense of responsibility for the quality of aid, as well as appropriate ethical attitude in the emergency action taken.

4. Recommended reading

- 1. ABC resuscytacji red. J. Jakubaszko. Wydawnictwo Górnicki. Wrocław 2006.
- 2. Adwenced LIFE SUPORT GROUP, Medycyna ratunkowa. Nagłe zagrożenia pochodzenia wewnętrznego. Górnicki Wydawnictwo Medyczne. Wrocław 2003
- 3. Ball C. M., Philips R.S., Medycyna stanów nagłych. WIG- Press. Warszawa 2002
- 4. Brongel L. Duda K., Mnogie i wielonarządowe obrażenia ciała. PZWL Warszawa 2001
- 5. Cline D.M. Medycyna Ratunkowa (red. Jakubaszko). Urban & Partner. Wrocław 2003
- 6. Davies C., Bashir Y., Nagłe stany w kardiologii. Via Medica. Gdańsk 2002.
- 7. Kiwerski J., Schorzenia i urazy kręgosłupa. PZWL. Warszawa 2001.
- 8. Klukowski K., Medycyna wypadków w transporcie. PZWL. Warszawa 2005.

5. Type of course

Obligatory

6. Teaching team

Department of Medicine

7. Course structure

Form	Number of hours	Semester	Year
Lecture	20	II	1
Classes	40	II	1
Laboratory			
Project			
Seminar	10/0	II	1
Other			
Total student's workload	120	II	1

8. Assessment methods

Grade

9. Language of instruction

Lecture at choice

ECTS credits	
2	_

Ethics

2. Course contents

Lecture:

Ethics as the field of study (definition, history, kinds). Connotation and denotation of the notions describing the individual and social moral reality. A context of basic ethical issues. Ethics and morality. Goods and values. Standard codes. Cultural patterns. Dignity of the human person. Fundamental laws of the human being. Peace as the highest moral value. Natural moral law. Moral character of the social life. Social principle of the common good. Ethical subsidiary principle. Principle of interpersonal solidarity. Principle of social justice. Principle of social love. Ethical professional codes. Civilization of life and civilization of death. Motives of realization of the interpersonal solidarity. Works carrying out the human solidarity. Selected naturalistic ethics. Selected anti-naturalistic ethics. Ethicality of the culture (science and religion). Virtues and faults.

3. Prerequisites

none

4. Laerning outcomes

The students are familiar with the basics in ethics. They understand that high ethicality of persons and professionalism of professional activities serve the best to personal development and building up the common good.

5. Recommended reading

Donn H. P.: Etyka dla lekarzy, pielęgniarek i pacjentów. BIBLOS. Tarnów 2007

Fenigsten R.: Eutanazja – śmierć z wyboru? Wydawnictwo W Drodze. Poznań 2002

Godność człowieka a prawa ekonomiczne i socjalne. Warszawa 2003.

Krąpiec M.: Ludzka wolność i jej granice. Lublin 2000.

Ossowska M.: Podstawy nauki o moralności. Warszawa 1994.

Szewczyk K.: Dobro, zło i medycyna: filozoficzne podstawy bioetyki kulturowej. PWN. Warszawa 2001.

Ślipko T.: Zarys etyki ogólnej. Kraków 2004.

Ślipko T.: Zarys etyki szczegółowej. Etyka osobowa. Kraków 2005.

Wojtyła K.: Elementarz etyczny. Wrocław 1982.

Wrońska I., Mariański J. (red.): Etyka w pracy pielęgniarskiej. Podręcznik dla studentów pielęgniarskich studiów licencjackich. Czelej. Lublin 2002

6. Type of course

Obligatory

7. Teaching team

Department of Medicine

8. Course structure

Form	Number of hours	Semester	year
Lecture	40	II	1
Classes			
Laboratory			
Project			
Seminar			
Other/ Self education	10	II	1
Total student's workload	60	II	1

9. Assessment methods

Grade (the written test)

10. Language of instruction

ECTS credits	
2	

History of medicine

2. Course contents

Lecture

History of medicine as a science and its tasks. Paradigm. Methods and sources.

Views of health and sickness in ancient history and middle ages. Reasons of disorders in ancient civilizations (Chinese, Greek, Roman, Arabic, Christian, Hebrew)

Development of therapy: herbal, Animals and mineral sources of therapeutics. Hippocrates, Galen, alchemy, medicine chemistry. Development of Pharmacia: Ehrlich, Domagk, Fleming, enzymes, hormones, vitamins.

Theory of pathology Since modern idea of health and sickness until Virchow cell pathology.

Development of internal medicine. Hermann Boerhaave. Vienna schools ("old" and "new"). Josef Skoda, Karl Rokitanski, Józef Dietl. Development of dermatology, pediatrics, neurology, psychiatry, and radiology. etc.

Surgery, its history. Beginning of surgery in ancient civilizations. Anatomical knowledge over ages. Triumph of surgery Since beginning of XIX century. Great polish surgeons. Anesthesia, antiseptic and aseptic methods.

Teaching medicine in ancient civilizations. Arabic doctors. Middle-age medicine. Schools in Salerno and Montpellier. Beginning of Universities. Science societies.

History of polish medicine from Kołłątaj's Jagiellonian University reform. Beginnings of polish medicine, herbal books. Great polish universities in Krakow, Lvov, Vilnius, Warsaw. Polish school of Philosophy of Medicine. Great scientists of polish medicine.

3. Prerequisites

Basic knowledge of history and humanities subjects form secondary school.

4. Learning outcomes

Ability to use historical sources in science. Knowledge of historical methods, opinions, views and ideas of medicine, the way of its development.

5. Recommended reading

Brzeziński T. (red.): Historia medycyny, wydanie 3. 2000

Szumowski W.: Historia medycyny filozoficznie ujęta. 1994.

Noszczyk W., Zarys dziejów chirurgii polskiej, PWN, Warszawa 1989.

Seyda B.: Dzieje medycyny. 1997

Rembieliński B.R., Kuźnicka B.: Historia farmacji. 1987. Thorwald J.: Dawna medycyna, jej tajemnice i potęga. 1990

6. Type of course

Obligatory

7. Teaching team

Department of medicine

8. Course structure

Form	Number of hours	Semester	Year
Lecture	40/10	I	1
Classes			
Laboratory			
Project			
Seminar			
Other/Self education	10/8	I	1
Total student's workload	60	I	1

9. Assessment methods

Grade

10. Language of instruction

ECTS credits	
2	

Philosophy

2. Course contents

Lecture

Basic problems of worldview: theories, hypotheses, scientific and religious data on the origins of the universe, the life and the man. Homerus, Hesiod and their works. The origin of the philosophy and her methods.

The Ionic philosophy. The sophistry. The Pythagorean School. Socrates, the ethics and the philosophical method of Socrates. The ethical intellectualism. The idealism of Plato, the idea of the man and the state.

Main categories of the philosophy of Aristotle: the matter, the form, the act, the potency, the creature, and the notion of the causality. The Aristotelian ethics "of the golden mean". The man and God according St. of Augustine. The philosophy of history St. of Augustine. Middle Ages. The genesis of the mediaeval university. The pantheism. Scholastics. Evidences of God existence: St.Anselm, and St.Thomas. The Thomistic idea of the existence and the man. Renaissance. Humanists philologists, psychologists and theologians.

Main ideas of Enlightenment. Encyclopedists. Basic categories of the philosophy of Descartes: the method, the methodical stepticism, *cogito*, and the dualism. Minimalist philosophy. The existentialism of J.P Sartre and G. Marcel. The idealism in Germany (Fichte, Scheling, Hegel). Nietzsche. Phenomenology and the philosophy of the value. Postmodernizm.

3. Prerequisites

The general knowledge of the humanistic problems on level of the college.

4. Learning outcomes

The student knows the chosen philosophical trends, and basic philosophical and ethical problems

5. Recommended reading

Tatarkiewicz W.: Historia filozofii, PWN, Warszawa, 2005.

Hempoliński M., Filozofia współczesna, Warszawa 1989.

Bartnik, C.S., Historia filozofii, Lublin, 2000.

Placz R., Klsycy filozofii, Wrszwa, 1987.

Galarowicz J., Jaworski W., Małęcka M., Zagadnienia i kierunki filozofii, Wybór tekstów, Kraków, 2000.

Russell B., Dzieje Filozofii Zachodu, Warszawa 2000.

6. Type of course

Optional

7. Teaching team

Department of Medicine

8. Course structure

Form	Number of hours	Semester	Year
Lecture	0/10	I	1
Classes			
Laboratory			
Project			
Seminar	40		
Other / Self education	10/8	I	1
Total student's workload	60	I	1

9. Assessment methods

Credit with note.

10. Language of instruction

ECTS credits	
2	

Logic

2. Course contents

The lecture

- 1. The creature of the logic (the logic, the formal logic, the methodology, the history of the logic, the philosophy of the logic),
- 2. The base of the logic (the object the feature, the gathering the element).
- 3. The theory of the language (the sign, syntactic categories, the language, the meta-language, the artificial language, the natural language, the scientific language).
- 4. The theory of names and definitions.
- 5. The logic of sentences, questions and answers.
- 6. Confirming of statements.
- 7. The deductive inference.
- 8. Logical rights. Errors in inferences.
- 9. Prima facie inference
- 10. Skills of the persuasion (elements of the eristic).
- 11. The presentation of fundamentals and rules of the present scientific thinking...

3. Prerequisites

The efficient knowledge from the range of humanities on level of the overgrammar-school.

4. Learning outcomes

The student knows: the creature and bases of the logic, impromptu logical to formulate thinks and to build the argumentation.

5. Recommended reading

Stanosz B.: Ćwiczenia z logiki, PWN, Warszawa, 2001

Ziembiński Z., Logika praktyczna, PWN, Warszawa, 1998.

6. Type of course

Optional

7. Teaching team

Department of Medicine

8. Course structure

Form	Number of hours	Semester	Year
Lecture			
Classes			
Laboratory			
Project			
Seminar	40/0	II	1
Other: selfeducation	10/0	II	1
Total student's workload	60/0	II	1

9. Assessment methods

Grade

10. Language of instruction