



Syllabus for academic year: 2021/2022													
Training cycle: 2018/2019-2023/2024													
Description of the course													
Course	Anaesthesiology and Intensive Therapy										Group of detailed education results		
											Group code F	Group name Interventional Clinical Sciences	
Faculty	Faculty of Medicine												
Major	medicine												
Level of studies	<input checked="" type="checkbox"/> X uniform magister studies <input type="checkbox"/> 1 st degree studies <input type="checkbox"/> 2 nd degree studies <input type="checkbox"/> 3 rd degree studies <input type="checkbox"/> postgraduate studies												
Form of studies	<input checked="" type="checkbox"/> X full-time <input type="checkbox"/> part-time												
Year of studies	IV						Semester:	<input checked="" type="checkbox"/> x winter <input type="checkbox"/> summer					
Type of course	<input checked="" type="checkbox"/> x obligatory <input type="checkbox"/> limited choice <input type="checkbox"/> free choice / optional												
Language of study	<input type="checkbox"/> Polish <input checked="" type="checkbox"/> X English												
Number of hours													
Form of education													
	Lectures (L)	Seminars (SE)	Auditorium classes (AC)	Major Classes – not clinical (MC)	Clinical Classes (CC)	Laboratory Classes (LC)	Classes in Simulated Conditions (CSC)	Practical Classes with Patient (PCP)	Foreign language Course (FLC)	Physical Education (PE)	Vocational Practice (VP)	Directed Self-Study (DSS)	E-learning (EL)
Winter semester:													
Department of Anaesthesiology and Intensive Therapy)							45						
Direct (contact) education ¹													
Distance learning ²	20												
Summer semester:													
..... (Dep. in charge of the course)													
Direct (contact) education													

¹ Education conducted with direct participation of university teachers or other academics

² Education with applied methods and techniques for distance learning



Distance learning													
TOTAL per year:													
Department of Anaesthesiology and Intensive Therapy													
Direct (contact) education							45						
Distance learning	20												
Educational objectives C1. Acquisition of knowledge and skills in the diagnosis of life-threatening conditions, the principles of using intensive therapy, suspicion and diagnosis of brain death, guidelines for cardiopulmonary resuscitation. C.2 - Teaching the principles of patient preparation for surgery. C.3 - Teaching the basics of general and regional anesthesia. C.4 - Teaching the rules of conducting pain therapy in various clinical situations. Solving ethical dilemmas in the care of a critically ill. C.5 -. Acquisition of skills in: performing basic and advanced resuscitation procedures with the use of an automatic external defibrillator, monitoring the patient in the perioperative period, assessing the unconscious state in accordance with the applicable scales, performing procedures and medical procedures, such as: monitoring vital signs at cardiomonitor assistance, pulse oximetry, oxygen therapy, assisted and replacement ventilation, introduction of the oropharyngeal tube, peripheral vein cannulation. C.6- Development social competences needed to practice the medical profession, in accordance with graduate's profile.													
Education result for course in relation to verification methods of the intended education result and the type of class:													
Number of detailed education result	Student who completes the course knows/is able to						Methods of verification of intended education results	Form of didactic class <i>*enter the abbreviation</i>					
F.W3	the principles of qualification for basic surgical procedures and invasive diagnostic and therapeutic procedures, the principles of their performance and the most frequent complications;						Evaluation of practical skills, Exam: final test Forming methods: Assessment of preparation for classes	L, CC					
F.W4	the principles of perioperative safety, preparing the patient for surgery, administering general and local anaesthesia and controlled sedation							L, CC					
F.W5	the postoperative treatment with pain therapy and postoperative monitoring							L, CC					
F.W6	the indications and principles of intensive care							L, CC					
F.W7	the cardiopulmonary resuscitation guidelines for newborns, children and adults							L, CC					
F.W15	the principles for suspicion and diagnosis of brain death							L, CC					
F.U5	insert intravenous line						Assessment of the student's work and activity during classes	CC					
F.U10	examine the nipples, lymph nodes, thyroid gland and abdominal cavity in terms of the acute abdomen and perform a finger examination through the rectum							CC					
F.U11	treat external bleeding							CC					
F.U12	perform basic resuscitation using an automated external defibrillator and other emergency procedures as well as first aid							CC					



F.U21	assess the condition of an unconscious patient according to international rating scales		CC
E.U24	interpret laboratory test results and identify causes of deviations from the norm;		CC
E.U25	administer nutritional treatment, including enteral and parenteral nutrition		CC
E.U36	deal with injuries		CC
E.U38	maintain patient medical records		CC

* L- lecture; SE- seminar; AC- auditorium classes; MC- major classes (non-clinical); CC- clinical classes; LC- laboratory classes; CSC- classes in simulated conditions; PCP- practical classes with patient; FLC- foreign language course; PE- physical education; VP- vocational practice; DSS- directed self-study; EL- E-learning

Student's amount of work (balance of ECTS points):

Student's workload (class participation, activity, preparation, etc.)	Student Workload
1. Number of hours of direct contact:	65
2. Number of hours of distance learning:	
3. Number of hours of student's own work:	100,5
4. Number of hours of directed self-study	n/a
Total student's workload	165,5
ECTS points for course	5

Content of classes:

Lectures: (10 weeks x2h = 20h take place online using the Teams platform)

1. Death of the brain.
2. Acute and chronic pain.
3. Shock.
4. Sepsis.
5. Basic of general anesthesia.
6. Acute respiratory failure- ventilator treatment.
7. Hemodynamic monitoring.
8. Extracorporeal therapy- organ function support.
9. Acute bleeding –diagnosis and treatment.
10. Basics of intensive pediatric therapy.

Seminars n/a

Classes : (45 hours, classes take place in direct contact with academic teacher according to the schedule: 8 X 4 hours = 32 hours in the Chair and Clinic of Anaesthesiology and Intensive Therapy and 2x6,5 hours = 13 hours in the Simulation Center.)

Exercise 1.

Organizational class. Entry test- knowledge of guidelines for cardiopulmonary resuscitation.
Monitoring and documentation in the intensive care unit.

Treatment of unconscious patients. Acid-alkaline and water-electrolyte balance with interpretation of tests.

Exercise 2.

Treatment of respiratory failure, principles of oxygen therapy. Airway cannulation - equipment demonstration

Exercise 3.

Treatment of acute circulatory failure. Electrocadiotherapy: defibrillation, cardioversion, cardiac electric stimulation.

Exercise 4.



Intravenous fluid delivery: central venous puncture - equipment demonstration. Principles of pressure measurement by invasive method. Haemodynamic monitoring.

Exercise 5.

The rules of artificial nutrition. Principles of renal replacement therapy. Diagnosis and treatment of infections in the intensive care unit.

Exercise 6.

Basics of intensive pediatric therapy. The specifics of pediatric anesthesia.

Exercise 7.

Preparation of the patient for surgery in adults. Basic methods of general anesthesia. Regional anesthesia. Monitoring of the patient during surgery. Specialized anesthesia.

Exercise 8.

Sudden cardiac arrest in adults and children. Postoperative analgesia in adults and children. Laboratory methods for multi-organ failure assessment.

Exercise 9.

Patient in ICU- septic, anaphylactic and hypovolemic shock. Skills: maintaining airway patency , peripheral access , patient monitoring- clinical simulation scenarios.

Exercise 10.

Anesthesia of the patient for surgery –management in cardiac arrest with VT/VF and asystole/PEA .

Exercises based on the material realized. Skills: maintaining airway patency, lumbar puncture, defibrillator handling- clinical simulation scenarios.

Other n/a

Basic literature (list according to importance, no more than 3 items)

1. Paul Marino, The Little ICU Book, Edition: 2end Ed, Lippincott Williams&Wilkins, 2016.
2. Textbook of Critical Care Fink MP., Abraham E., Vincent JL., Kochanek PM Philadelphia 2011, VII-th Edition Elsevier
3. Fundamental of Anaesthesia, T. Smith, C. Pinnock, et al, Feb. 2011

Additional literature and other materials (no more than 3 items)

1. 2015 ERC Guidelines for Adult Basic Life Support
2. 2015 ERC Guidelines for Pediatric Basic Life Support

Preliminary conditions: (minimum requirements to be met by the student before starting the course)
knowledge of anatomy, pathophysiology, internal diseases, knowledge of guidelines for cardiopulmonary resuscitation in 2015-entry test.

Conditions to receive credit for the course:

Assessment is made in direct contact with an academic teacher or using electronic means of communication.

The condition to receive credit for the course is to attend all classes in accordance with the Study Regulations. In the case of an excused absence - the student is obligated to make up the classes after prior agreement with the teaching adjunct. Each absence must be made up, including rector days and dean's hours - the way and form of doing the classes after prior arrangement with a teaching adjunct.

Admission to the exam-positive passing of practical skills.

Final exam is written test. It consists of 60 questions and only one answer is correct. To pass the exam the student must to have a minimum of 60% of correct answers. The criteria given in % may only be reduced after analyzing the degree of difficulty of the test.



Grade:	Criteria for courses ending with a grade ³
Very Good (5.0)	has knowledge of each of the content of education at the level of 90% -100%
Good Above (4.5)	has knowledge of each of the content of education at the level of 84% -89%
Good (4.0)	has knowledge of each of the content of education at the level of 77% -83%
Satisfactory Plus (3.5)	has knowledge of each of the content of education at the level of 70% -76%
Satisfactory (3.0)	has knowledge of each of the content of education at the level of 60% -69%
	Criteria for courses ending with a credit³
Credit	Does not apply

Grade:	Criteria for exam ³
Very Good (5.0)	90-100% of correct answers
Good Above (4.5)	84-89% of correct answers
Good (4.0)	77-83% of correct answers
Satisfactory Plus (3.5)	70-76% of correct answers
Satisfactory (3.0)	60-69% of correct answers

Department in charge of the course:	Chair and Department of Anaesthesiology and Intensive Therapy
Department address:	50-556 Wrocław, ul. Borowska 213
Telephone:	71 733 23 10
E-Mail:	kai@umed.wroc.pl

Person in charge for the course:	Waldemar Goździk, MD, Professor, Ph. D
Telephone:	71 733 23 10
E-Mail:	waldemar.gozdzik@poczta.umed.wroc.pl

List of persons conducting specific classes:

Name and surname	Degree/scientific or professional title	Discipline	Performed profession	Form of classes
Barbara Adamik	MD, Ph.D	Biological sciences	Medical Analyst	L, CC
Barbara Barteczko-Grajek	MD, Ph.D	Medical sciences	physician; u.t.	CC,
Waldemar Gołębiowski	MD, Ph.D	Medical sciences	physician; u.t.	CC
Waldemar Goździk	MD, Professor, Ph. D	Medical sciences	physician; u.t.	L, CC
Bogusława Lechowicz-Głogowska	MD, Ph.D	Medical sciences	physician; u.t.	CC
Małgorzata Grotowska	MD,	Medical sciences	physician; u.t.	CC
Anna Kupiec	MD, Ph.D	Medical sciences	physician; u.t	CC
Tomasz Skalec	MD, Ph.D	Medical sciences	physician; u.t	CC
Jakub Śmiechowicz	MD, Ph.D	Medical sciences	physician; u.t	CC
Marek Wełna	MD, Ph.D	Medical sciences	physician; u.t	CC
Marzena Zielińska	MD, Ph.D	Medical sciences	physician; u.t	L, CC
Stanisław Zieliński	MD, Ph.D	Medical sciences	physician; u.t	CC

Date of Syllabus development

Syllabus developed by

³ The verification must cover all education results, which are realize in all form of classes within the course



28.06.2021

B. Barteczko-Grajek, MD Ph.D.

Dean's signature

Wrocław Medical University
Faculty of Medicine
Vice-Dean for English Studies

prof. Beata Spieszczańska, PhD

Signature of Head(s) of teaching unit(s)


dr hab. n. med. Waldemar Goździk, prof. nadzw.