



Subject card

Subject name and code	, PG_00056094						
Field of study	Mechanical and Medical Engineering						
Date of commencement of studies	October 2023		Academic year of realisation of subject		2025/2026		
Education level	first-cycle studies		Subject group		Subject group related to scientific research in the field of study		
Mode of study	Full-time studies		Mode of delivery		at the university		
Year of study	3		Language of instruction		Polish		
Semester of study	6		ECTS credits		1.0		
Learning profile	general academic profile		Assessment form		assessment		
Conducting unit	Institute of Mechanics and Machine Design -> Faculty of Mechanical Engineering and Ship Technology						
Name and surname of lecturer (lecturers)	Subject supervisor		Bartosz Trzeciak				
	Teachers						
Lesson types and methods of instruction	Lesson type	Lecture	Tutorial	Laboratory	Project	Seminar	SUM
	Number of study hours	0.0	0.0	15.0	0.0	0.0	15
	E-learning hours included: 0.0						
Learning activity and number of study hours	Learning activity	Participation in didactic classes included in study plan		Participation in consultation hours		Self-study	SUM
	Number of study hours	15		0.0		0.0	15
Subject objectives	Acquainting the student with the techniques of pre-medical assistance to victims of injuries, including those in life-threatening situations.						

Learning outcomes	Course outcome	Subject outcome	Method of verification
	[K6_U01] he/she is able to acquire knowledge and self-studying, he/she is able to find needed information in specialist books, databases and other sources, he/she is able to integrate information and draw conclusions, he/she is able to communicate by using different technics in work and outside	The student is able to use medical library, scientific databases and other sources.	[SU5] Assessment of ability to present the results of task
	[K6_U10] he/she is able to assess the human body physic and basic functioning of the body organs, he/she is able to use basic medical knowledge to solve mechanical-medical problems in the scope of the MME study	The student is able to assess the basic parameters of the heart and cardiovascular system.	[SU1] Assessment of task fulfilment
	[K6_W12] he/she has basic knowledge in the field of fundamental medical sciences, human body anatomy, and physiology, salvage service	The student has knowledge of the structure of human organs and basic medical equipment used in emergency medical services.	[SW1] Assessment of factual knowledge
	[K6_K02] he/she is aware of importance of professional dealing and to fulfill ethics obligations, he/she understands other (non-technical) abilities of mechanical engineering professional, their influence on the society and security of environment, he/she is aware of importance of social cooperation	The student understands the non-technical aspects of an engineer's work in a hospital, has the habit of working in order and cleanliness, is vigilant in anticipating potential problems and errors	[SK5] Assessment of ability to solve problems that arise in practice
	[K6_U11] he/she uses basic medical apparatus and devices, he/she applies knowledge related to the visual diagnosis in the scope of the MME study	The student is able to use basic medical equipment used in first aid, i.e. oropharyngeal tube, self-inflating bag, automatic defibrillator. Student can treat injuries as part of pre-medical aid.	[SU3] Assessment of ability to use knowledge gained from the subject
	[K6_U12] he/she applies basic life-saving activities in the scope of lavage service	The student knows how to follow the ABC first aid algorithm.	[SU1] Assessment of task fulfilment

Subject contents	<p>1. Assessment of the patient's condition to determine the management.</p> <p>2. Place the patient in the correct position for the type of illness or injury.</p> <p>3. Basic cardiopulmonary resuscitation in adults and children.</p> <p>4. Deviceless restoration of airway patency.</p> <p>5. Instrumental restoration of airway patency using, in particular, an oropharyngeal tube and a nasopharyngeal tube.</p> <p>6. Oxygen administration.</p> <p>7. Supporting breathing or providing replacement ventilation with the use of: face mask, respiratory valve, self-inflating bag.</p> <p>8. Perform an automatic defibrillation.</p> <p>9. Monitoring of respiratory system functions.</p> <p>10. Monitoring the functions of the circulatory system.</p> <p>11. Assessment of patient awareness according to the Glasgow scale and the assessment of pupil width and their reaction to light.</p> <p>12. Determination of glucose concentration using a glucometer.</p> <p>13. Dressing wounds.</p> <p>14. Immobilization of fractures, sprains and sprains.</p> <p>15. Immobilizing the spine with particular emphasis on the cervical segment.</p> <p>16. Medical segregation in case of mass incidents and catastrophes.</p> <p>17. Practical classes on medical phantoms.</p>		
Prerequisites and co-requisites	Knowledge of anatomy, human physiology and propaedeutics of internal diseases.		
Assessment methods and criteria	Subject passing criteria	Passing threshold	Percentage of the final grade
	Colloquium	60.0%	100.0%
Recommended reading	Basic literature		<p>2021 Resuscitation Guidelines Polish Resuscitation Council.</p> <p>Teaching materials discussed in class.</p>
	Supplementary literature		OSTRE STANY ZAGROŻENIA ŻYCIA W CHOROBAH WEWNĘTRZNYCH ed. Franciszek Kokot, Publisher: PZWL
	eResources addresses		Adresy na platformie eNauczanie:
Example issues/ example questions/ tasks being completed			
Work placement	Not applicable		