Subject	Exercise Physiology		
Type	Type	Semester	ECTS
	MANDATORY (M)	III	4
Lecturer	Dr. Sc. Masar Gjaka		
Aims and Objectives	The course will provide students an introduction into the fundamentals of the physiological adjustments that occur within the body during exercise. Furthermore, this course will be particularly oriented toward a basic understanding of the physiological systems as they are affected by the activity of a normal coaching or teaching situation.		
Learning Outcomes	On the completion of this course, students will: ✓ Gain knowledge and understanding how the human body responds and adapts to physical activity and exercise and which energy systems are involved. ✓ Understand the changes in cardiac output, heart rate, and stroke volume during exercise. ✓ Apply exercise physiology principles to design effective training programs. ✓ Understand how human body reacts to acute stress caused by exercise and how it adapts itself to chronic stress caused by permanent exercise practice. ✓ Explain the theoretical principles and physiological mechanisms that underpin the body's response and adaptation to the stimulus of exercise in a variety of environments.		
Content	**Week**	**Topics**	
	1	Presentation of the subject	
	2	Introduction to exercise physiology	
	3	Structure and function of skeletal muscles	
	4	Bioenergetics and metabolism during exercise	
	5	Nervous control and muscles	
	6	Hormonal control during exercise	
	7	**Mid-term exam – 1**	
	8	Energy expenditure and fatigue	
	9	Cardiovascular system and its regulation	
	10	Reactions of the cardiorespiratory system	
	11	Adaptations to resistance exercises	
	12	Adaptations to aerobic and anaerobic training	
	13	Physiological reactions to acute or chronic exercises in different environmental conditions	
	14	Body composition and nutrition in sports	
	15	**Mid-term exam – 2**	
Teaching/Learning Methods	Activity		Weight (%)
	Lectures		40%
	Lab		40%
	Research		10%
	Independent learning		10%
Assessment Methods	**Methods of assessment:**		%
	Participation		10%
	a) Mid-term exam -1		20%
	b) Mid-term exam - 2		20%
	Seminars		10%
	Individual and group work		10%
	Final exam		30%

Resources	**Resources**		**Number**
	Lectures		1
	Presantations		1
	Web of science		1
	PubMed		1
	Scopus		1
ECTS Workload	**Activity**	**Weekly hours**	**Workload**
	Lectures	2	24
	Lab	1	12
	Independent learning	n/a	44
	Examination preparation	n/a	20
Literature	• Klissouras V. Fundamentals of Sport and Exercise Physiology. A guidebook prepared for students of the Training of Trainers Program in Physical Education and Sport. European Union Office Kosovo, Pristina 2013 (translated into Albanian language). • Kenney WL, Wilmore JH, Costill DL. Physiology of Sport and Exercise (5th ed.). Human Kinetics. Champaign, IL (2012). Beside the indicated books, scientific publications relevant to the field will be used to prepare the lectures, which will be made available for students through the moodle platform.		
Ethical standards	This course follows UBT College's Code of Ethics, requiring all students to behave accordingly. Any case of academic misconduct, including but not limited to cheating, plagiarism, or other forms of dishonesty, will lead to significant punishment such as failure of the specific assessment or the entire course, as well as further disciplinary measures in accordance with UBT College's academic integrity policies.		
Contact	masar.gjaka@ubt-uni.net		