

SYLLABUS

Course description

Course code	Course	SYSTEMY ERP		
MB/O/I/ST/C1B.1		ERP SYSTEMS		
Language of instruction	English			
Academic year	2023/2024			
field of study:	Mechanics and machine construction			
field of specialisation:	CAE			
Educational level	first-cycle studies			
Education profile	general academic			
Mode of study	full-time studies			
Semester(s)	6			
Affiliation with a group of classes	Specialization module			
Course status	Eligible			
Types of classes, instruction hours, ECTS credits	Types of classes	Number of instruction hours	Number of ECTS credits	
	Lecture	15[h]	2 ECTS	
	Project	15[h]		
Linkage of the course	with the education profile	related to the conducted scientific activity in the discipline to which the field of study is assigned (general academic profile)		0 ECTS
	with qualifications	serves the student to acquire engineering competences		2 ECTS
	with science discipline	Mechanical Engineering		2 ECTS
Form of teaching	Traditional – classes organized at the University /classes conducted using online learning methods and techniques			
Prerequisites	-			
Department	Faculty of Mechanical Engineering			
Coordinator	Przemysław Motyl, PhD			
The website of the basic organizational unit	www.wm.uniwersytetradom.pl			
E-mail address, phone number of the coordinator	p.motyl@uthrad.pl			

LEARNING OUTCOMES, CURRICULUM CONTENT, TEACHING CLASSES, VERIFICATION OF LEARNING OUTCOMES

Learning Objective:	The aim of the education is to present the role of ERP class systems in modern manufacturing companies.
Curriculum Content:	Lesson content: In the field of ERP systems, the basic functionalities of ERP systems will be discussed, such as: sales, purchases / orders, production, storage, human resources, document circulation, analytics and reporting. Modularity will also be discussed, allowing to extend the functionality supporting the management of key business areas of manufacturing companies. The last element in the field of ERP systems will be to raise the subject of databases, their analysis and the need for continuous expansion of the system along with the changing business environment.
Didactic (educational) methods:	Lecture with the use of visual techniques. Laboratory classes with the use of computers – individual or group work
Course assessment type, the criteria for assessing the achieved learning outcomes, and the method of calculating the final grade:	The condition for passing a subject is to achieve all the required learning outcomes specified for a given subject. Obtaining positive grades in all forms of classes included in the course is tantamount to passing it and gaining by the student the number of ECTS points assigned to the subject. The final grade is the average of grades from all forms of classes included in the course.

Learning outcomes for the course in relation to the field of study learning outcomes and the type of classes				Methods of verifying learning outcomes	
Learning outcome number	Description of the learning outcomes for the course (PEU) A student who has passed the course (W) knows and understands / (U) can / (K) is ready to:	Field of study learning outcome (KEU)	Types of classes	Form of verification (credits)	Methods of testing and assessment
W1	The student has knowledge about the use of ERP information systems in the management of the production of machine parts.	K_WK21	lecture	Credit for assessment	Colloquium
U1	The student is able to manage documentation in the process of manufacturing machine parts in a production company.	K_UW12	project	Credit for assessment	Correct execution of the task
U2	The student is able to design products, processes and manufacturing systems in a PLM environment.	K_UW05 K_UW09 K_UW12	project	Credit for assessment	Correct execution of the task

Literature and teaching aids
[1] Tadeusz Gospodarek, Systemy ERP. Modelowanie, projektowanie, wdrażanie, Wydawnictwo Helion, 2016 [2] Jerzy Auksztol, Piotr Balwierz, Magdalena Chomuszkó, SAP Zrozumieć system ERP, Wydawnictwo Naukowe PWN, Warszawa, 1, 2020 [3] Ireneusz Rutkowski, Rozwój nowego produktu. Metody i uwarunkowania, Wydawnictwo PWE, 2015 [4] Odd Jøran Sagegg, Erlend Alfnes, ERP Systems for Manufacturing Supply Chains: Applications, Configuration, and Performance 1st Edition, ISBN-13 978-1032474762

Student workload required to achieve the assumed learning outcomes – the balance of ECTS credits			
Attendance, participation	Student workload [h].		
	Other contact hours (IGK)	Student's self-study hours Classes without a teacher (ZBN)	Classes
Participation in ... lectures	X	X	30 [h]
Participation in classes/laboratory classes	X	X	...[h]
Meeting with teachers during their duty hours	2 [h]	X	X
Preparation for lectures/classes/.... , Preparation for ... credit / exam	X	15 [h] 3 [h]	X
Total student workload	2 [h]/ 0,1 ECTS	18 [h]/ 0,7 ECTS	30 [h]/ 1,2 ECTS
ECTS credits for the course	50 h/ 2 ECTS		

Additional information, comments
<p>In the case of students with special needs, including disabilities, and chronic illnesses, the methods and forms of verification of learning outcomes specified above (in the syllabus) are adapted to the individual needs of these students, as appropriate.</p> <p>Detailed rules and forms of support for students with special needs, including those with disabilities and chronically ill, during classes, credits, and exams are specified in: University Regulations (Regulamin Studiów Uniwersytetu Technologiczno-Humanistycznego w Radomiu), Study Regulations (Zasady Studiowania), and Procedure for Ensuring Accessibility of the Educational Process to Students with Special Needs, Including Those with Disabilities and Chronically ill (Procedura dotycząca zapewnienia dostępności procesu kształcenia studentom ze szczególnymi potrzebami, w tym: z niepełnosprawnością, przewlekle chorych).</p>

