

COURSE GUIDE – short form

Academic year 2014 - 2015

Course name ¹	Robotic Systems Manufacturing and Assembly					Course code	RBT.413. DO.DS-1		
Course type ²	DS	Category ³	DO	Year of study	IV	Semester	7	Number of credit points	4

Faculty	Mechanics	Number of teaching and learning hours ⁴						
Field	Mechatronics and Robotics	Total	L	T	LB	P	IS	
Specialization	Robotics	42	28	-	14	-	42	

Pre-requisites from the curriculum ⁵	Compulsory	
	Recommended	

General objective ⁶	The course aims as future professionals to acquire information and knowledge on flexible manufacturing systems and automation of production. The practical work in the laboratory aim to strengthen knowledge being presented.
Specific objectives ⁷	<ul style="list-style-type: none"> Information on the place and role of robotic systems for manufacturing and assembly in current production. Presentation of the structure and hierarchy of the organizational forms of flexible manufacturing systems. Analysis and synthesis of robotic manufacturing and assembly systems. Technological planning principles presentation; Laws and procedures for planning decision technology in flexible manufacturing systems.
Course description ⁸	Introduction to manufacturing systems. Place of industrial robots in manufacturing systems. Flexible robotic manufacturing systems. Flexible robotic assembly systems. Transport subsystem manufacturing and assembly robotic systems. Control subsystem manufacturing and assembly robotic systems.

Assessment			Schedule ⁹	Percentage of the final grade (minimum grade) ¹⁰
Continuous assessment	Class tests along the semester			%
	Activity during tutorials/ laboratory works/projects/practical work		Week 1-14	40%
	Assignments, homework			
Final assessment	Final assessment form ¹¹	Exam	Exam period	60%
	Examination procedures and conditions: 1. Exam with three subjects from the curriculum, time 2 h, percent of the final grade 60 %. 2. Applications evaluation, percent of the final grade 40 %.			

Course organizer	prof. dr. ing. Leohchi Dumitru	
Teaching assistants	prof. dr. ing. Leohchi Dumitru	