


Discipline	Design of Electronic Equipment	code: 5543 Semester – /summer/	
Specialty	Electronics		
ECTS credits: 7	Form of assessment: Exam		
Lecturer	Associate Professor, PhD Toncho Papanchev Room: 208E Phone: +359 895550851 E-mail: t.papanchev@tu-varna.bg		
Department	Department of Electronics and Microelectronics		
Faculty	Faculty of Computer Sciences and Automation		
Learning objectives			
The curriculum of the course “Design of Electronic Equipment” aims to introduce students to the specificities of construction and design of electronic equipment. Among the topics, covered by the course are basics technologies, requirements and rules for construction of electronic devices, the specific technological processes used during the manufacturing of electronic devices, the construction of electronic components, units and blocks of electronic equipment and common problems and solutions to problems connected to influences destabilizing the operation of electronic components and devices. Students study the basic concepts and techniques for analyzing and evaluating the reliability of electronic products.			
CONTENTS:			
Training Area		Hours lectures	Hours seminar exercises

Design and construction of low voltage mains transformers	6	6
Design and construction of audio transformers	5	6
Design and construction of pulse transformers	5	3
Contacts and connectors in electronic devices	2	-
Technology of electronic equipment manufacturing	2	3
Assembly of electronic equipment.	2	3
Reliability of electronic components and systems.	4	3
Heat transfer in electronic devices.	2	3
Electronic devices protection from external and environmental destabilizing factors.	2	3
TOTAL: 60 h	30	30