

Vocational School of Health Services / Medical Imaging Techniques

2024 - 2025 Academic Year

MEDICAL INFORMATION TECHNOLOGIES

Syllabus

Course Description					
Name	Code	Semester	T+A Hour	Credit	ECTS
MEDICAL INFORMATION TECHNOLOGIES	TGT1215031	Spring Semester	2+0	2	2
Prerequisites Courses					
Recommended Elective Courses					
Language of Instruction	Turkish				
Course Level	Short Cycle (Associate's Degree)				
Course Type	Elective				
Course Coordinator	Lect. Mehmet Siddik CEBE				
Name of Lecturer(s)	Assist.Prof. Mustafa ÇAĞLAR, Lect. Mehmet Siddik CEBE				
Assistant(s)					
Aim	The aim of this course is to provide an understanding of the basic concepts, techniques and methods for the use of information technologies in health services. Within the scope of this course, basic concepts of information technologies such as personal health record, medical information, Informatics, Computer, Technological Development, professional concepts and applications, programming languages and current software (Word, Excel, Power Point) applications constitute the basic course content.				
Course Content	This course contains; Operating logic of computers, binary number systems, units of capacity in computers.,Memory (RAM), disk drives, hardware cards, input/output hardware, keyboard keys and usage,Computer Hardware, Motherboard, Bios, Display Plus, Sound Card,MS Word - Insert graphics, headers, footers, page numbers, links and objects,MS Word - track changes, create equations, add controls,MS Power Point- Work with slides, add, edit, delete,MS Power Point- Add Animation to Text,Excel Overview (Workbook, Worksheet, Cells, Toolbars),Selection operations (selecting a single cell, multiple cells, non-contiguous cells, rows and columns), data entry (entering data in a single cell, multiple cells, creating data arrays),Ready functions (add, multiply, round, round down, round up, even, odd, integer, absolute, square root, average, min, max, greater than, less than, less than and yada, if, equal, integer, search, date and time functions),Sorting, filtering data, charts (chart types, chart preparation),Patient Registration Modules I,Patient Registration Modules II,Patient Registration Modules III.				
Course Learning Outcomes			Teaching Methods	Assessment Methods	
Introducing the basic hardware units and operating systems of the computer, giving information about the use of the internet and gaining the basic knowledge and skills necessary to prepare documents, spreadsheets and presentations on the computer using office programs and patient registration-acceptance modules used in health services will be explained in the course.			10, 12, 14, 5, 6, 8, 9	A, E, F	
Teaching Methods	10: Discussion Method, 12: Problem Solving Method, 14: Self Study Method, 5: Cooperative Learning, 6: Experiential Learning, 8: Flipped Classroom Learning, 9: Lecture Method				
Assessment Methods	A: Traditional Written Exam, E: Homework, F: Project Task				
Lecture Schedule					
Sequence	Topics	Preliminary Preparation			
1	Operating logic of computers, binary number systems, units of capacity in computers.	Lecture Notes			
2	Memory (RAM), disk drives, hardware cards, input/output hardware, keyboard keys and usage	Lecture Notes			
3	Computer Hardware, Motherboard, Bios, Display Plus, Sound Card	Lecture Notes			
4	MS Word - Insert graphics, headers, footers, page numbers, links and objects	Lecture Notes			
5	MS Word - track changes, create equations, add controls	Lecture Notes			
6	MS Power Point- Work with slides, add, edit, delete	Lecture Notes			
7	MS Power Point- Add Animation to Text	Lecture Notes			
8	Excel Overview (Workbook, Worksheet, Cells, Toolbars)	Lecture Notes			
9	Selection operations (selecting a single cell, multiple cells, non-contiguous cells, rows and columns), data entry (entering data in a single cell, multiple cells, creating data arrays)	Lecture Notes			
10	Ready functions (add, multiply, round, round down, round up, even, odd, integer, absolute, square root, average, min, max, greater than, less than, less than and yada, if, equal, integer, search, date and time functions)	Lecture Notes			
11	Sorting, filtering data, charts (chart types, chart preparation)	Lecture Notes			
12	Patient Registration Modules I	Lecture Notes			
13	Patient Registration Modules II	Lecture Notes			
14	Patient Registration Modules III	Lecture Notes			
Evaluation Methods		Weight(%)			
Midterm Exam		40			
General Exam		60			
Resources					
Telemedicine Technologies: Information Technologies in Medicine and Digital Health, Bernard Fong (Author), A. C. M. Fong (Author), C. K. Li (Author), WileyStanford CS-101 lecture notes, instructor lecture notes					