

# Меѓународен Универзитет Визион - International Vision University Universiteti Ndërkombëtar Vizion - Uluslararası Vizyon Üniversitesi

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## **SYLLABUS**

COURSE NAME	COURSE CODE	SEMESTER	COURSE LOAD	ECTS
MULTIMEDIA SYSTEMS	CEN -3006	6	180	6

Prerequisite(s)	None
Course Language	Macedonian, Turkish, English
Course Type	Obligatory
Course Level	First Cycle
Course Lecturer	
<b>Course Assistants</b>	
Classroom	
Extra-Curricular Office Hours and Location	
Course Objectives	Multimedia data has become an indispensable part of our daily life and modern computer technology. Multimedia hardware and software, issues in effectively representing, processing and transmitting multimedia data topics will be introduced in multimedia systems design.
Course Learning Outcomes	The students who complete the course successfully; • Develop problem-solving skills in digital media design at a specific time. In a Multimedia Designer's basic needs and the needs of university education and then be able to analyze how to use it. Will be able to decide about creative thoughts and ideas on how to transfer the application. A project which is able to design process from idea to final execution. will be able to evaluate the issue of how to use the Moving and interactive media attention and basic animation and interaction techniques.
<b>Course Contents</b>	This course will give information about principles and current technologies of multimedia systems. Representing, processing, and retrieving multimedia data such as sound, music, image, animation, video and graphics will be discussed.

## WEEKLY SUBJECTS AND RELATED PREPARATION STUDIES

Week	Subjects	Related Preparation
1	Introduction to Multimedia Systems	Related Chapters of Course Sources
2	Multimedia Tools and Libraries (Matlab, SDL, OpenCV and Others)	Related Chapters of Course Sources
3	Information Theory and Transmission	Related Chapters of Course Sources
4	Lossless Compression	Related Chapters of Course Sources
5	Lossless Compression	Related Chapters of Course Sources
6	Image Processing and Analysis in Multimedia Applications	Related Chapters of Course Sources
7	Mid-term Exam	Related Chapters of Course Sources
8	Audio Analysis, Compression and Standards	Related Chapters of Course Sources
9	Motion and Video Compression	Related Chapters of Course Sources
10	Content based Multimedia Retrieval	Related Chapters of Course Sources
11	Animation	Related Chapters of Course Sources
12	Project Presentation-1	Related Chapters of Course Sources
13	Project Presentation-2	Related Chapters of Course Sources
14	Project Presentation-3	Related Chapters of Course Sources
15	Final Exam	Related Chapters of Course Sources

## ECTS / WORKLOAD TABLE

Presentation / Seminar			
Hours for off-the-classroom study (Pre-study,	14	2	42
practice)	14	3	42
Midterm Exam	1	12	12
Final examination	1	14	14
Total Work Load			
ECTS	6		

#### GENERAL PRINCIPLE RELATED WITH COURSE

Dear students,

You need to be included in the flow, please follow the course of learning and using that to achieve our success you deserve, you need to practice every day on topics that are covered by the course. It takes practice reading basic and auxiliary literature that is strictly recommended. You should visit classes course I need to make an effort to visit all the professors' lectures. Your activity on the session will be assessed by your professors and the Battle active participant in the discussions that will take place during the time. Students visiting lectures for all at the end if an additional 15 points.

#### **SOURCES**

	COMPULSORY LITERATURE				
No	Name of the book Author's Name, Publishing house, Publication Year				
1	Multimedya ve Görsel Tasarım	Ayten Öztürk , Dr. Serkan Perkmen PROFİL YAYINCILIK ,2009			
2					
3	Ralf Steinmetz, Klara Nahrstedt	Multimedia Fundamentals: Media Coding and Content Processing			

ADDITIONAL LITERATURE			
No	Name of the book	Author's Name, Publishing house, Publication Year	
1	Multimedya Öğreniyorum	William D. Harrel ALFA YAYINLARI	
2			
3	Multimedia Systems	Ralf Steinmetz, Klara Nahrsted	

#### **EVALUATION SYSTEM**

Underlying the Assessment Studies	NUMBER	PERCENTAGE OF GRADE
Attendance/Participation	15	%10
Project / Event	1	%20
Mid-Term Exam	1	%35
Final Exam	1	%35
TOTAL	17	%100

## ETHICAL CODE OF THE UNIVERSITY

In case students are cheating on exams or preparation the same, it is not making reference to the source to be used in studies, as for example in assignments, projects and presentation (plagiarism), in accordance with legislations by Ministry of Education and Science of the Republic of Macedonia and International Vision University, apply relevant disciplinary rules. International Vision University students are expected never attempts in this kind of behavior.