

# **CAP 5011 MULTIMEDIA DESIGN**

**Instructor:** Borko Furht, Professor of CSE  
**Prerequisite:** Graduate status or permission of instructor

**Course Description:** This is the project-oriented course which will use the Multimedia Laboratory. Introduction to multimedia systems. Multimedia hardware and software systems. Multimedia development tools. Overview of multimedia applications. Complete process of multimedia system specification, design, testing, and prototyping. Student projects. CD-ROM creation.

## **Course Outline:**

1. Introduction to multimedia systems: video and image formats, multimedia compression, networking, storage, I/O, indexing, and retrieval.
2. Multimedia laboratory: software, hardware, various equipment
3. Video and audio capture and playback techniques
4. Multimedia software development tools
5. Multimedia applications
6. Step-by-step procedure in developing multimedia systems: (specification, design, testing, and prototyping)
5. Student projects - developing multimedia presentations.

## **Reference book:**

1. B. Furht, "Multimedia Tools and Applications", Kluwer Academic Publishers, 1996.

## **Software and User Manuals:**

1. Using Compel
2. Asymetrix Digital Video Producer
3. Asymetrix 3DF/X
4. Asymetrix Toolbox
5. Macromedia Director

## **Grading format:**

### Multimedia Project

- |                                   |     |
|-----------------------------------|-----|
| 1. Specification                  | 10% |
| 2. Documentation and Final Report | 20% |
| 3. Multimedia Presentation        | 60% |
| 4. Oral Presentation              | 10% |

