

COMMON COURSE NUMBER: PGY 2850C

COURSE TITLE: Digital Video/Audio Editing

CREDIT HOURS: 3

CONTACT HOURS BREAKDOWN:

Lecture/Discussion 32

Lab 32

Other

Contact Hours/Week 4

CATALOG COURSE DESCRIPTION:

Prerequisite: OST1831

Corequisite: None

Concepts and techniques of video/audio production for recording. Using full-motion video camera and video editing and sound editing software, students will produce video and sound modules for inclusion in multimedia projects. Video formats, signals, compression standards, capture and equipment will be emphasized. Sound formats including compression standards, sampling, resource management, software and equipment selection will be studied. Copyright issues will be discussed.

General Education Requirements - Associate of Arts Degree, meets Area(s):

General Education Requirements - Associate in Science Degree, meets Area(s):

UNIT TITLES:

1. Video and sound formats, compression, equipment, software, and resource management.
2. Creating video for multimedia projects.
3. Digitizing video for multimedia projects.
4. Editing video for multimedia projects.
5. Creating audio for multimedia projects.
6. Editing audio for inclusion in multimedia projects.
7. Importing video and sound into multimedia projects.
8. Copyright issues.

I. Course Overview:

Upon successful completion of this course, the students should be able to produce and edit video and audio for multimedia projects.

II. Units:

Unit 1. Video and Sound Formats, Compression, Equipment, Software, and Resource Management

General Outcome:

- 1.0 The students should be able to identify video and sound formats, compression techniques, equipment and software needed, and resources required to complete video and sound for multimedia projects.

Specific Learning Outcomes:

Upon successful completion of this unit, the students should be able to:

- 1.1 Identify video formats.
- 1.2 Identify sound formats.
- 1.3 Discuss spatial, temporal, frame rate, image size, and symmetry of video compression.
- 1.4 Discuss analog versus digital sound, sampling rates and resolution, MIDI, and other sound issues.
- 1.5 Identify video and sound equipment and software.
- 1.6 Discuss resource management of video and audio files.

Unit 2. **Creating Video for Multimedia Projects**

General Outcome:

2.0 The students should be able to create video for multimedia titles.

Specific Learning Outcomes:

Upon successful completion of this unit, the students should be able to:

- 2.1 Identify target audience for video.
- 2.2 Describe constraints and considerations for video.
- 2.3 Create video scripts for multimedia video segments.
- 2.4 Shoot a scripted multimedia video segment.

Unit 3. Digitizing Video for Multimedia Projects

General Outcome:

3.0 The students should be able to digitize video for multimedia titles.

Specific Learning Outcomes:

Upon successful completion of this unit, the students should be able to:

- 3.1 Identify video digitizer (video capture card).
- 3.2 Transform analog video to digital format.
- 3.3 Sample the analog video at a certain rate to a given resolution.
- 3.4 Convert the video signal into RGB format.
- 3.5 Compress and store the information.

Unit 4. Editing Video for Multimedia Projects

General Outcome:

4.0 The students should be able to edit video for multimedia titles.

Specific Learning Outcomes:

Upon successful completion of this unit, the students should be able to:

4.1 Use software to edit video for inclusion in multimedia titles.

4.2 Open file to edit.

4.3 Open folders which can include still images in Bitmap, TIFF, and Targa formats to include in video clips.

4.4 Use the Clip window to preview, trim, and edit video.

4.5 Use the Construction window to assemble and implement video decisions.

4.6 Use editing tools to complete video editing and preview the clip.

4.7 Compile effects, add special effects, create custom transitions, and add filters.

4.8 Create motion paths, super-impose elements, and title projects.

4.9 Compile the final project and save the file for inclusion in multimedia projects.

Unit 5. Creating Audio for Multimedia Projects

General Outcome:

5.0 The students should be able to create audio for multimedia titles.

Specific Learning Outcomes:

Upon successful completion of this unit, the students should be able to:

- 5.1 Identify target audience for audio.
- 5.2 Record or import sound for multimedia.
- 5.3 Import or record MIDI (Musical Instrument Digital Interface) for multimedia.

Unit 6. Editing Audio for Multimedia Projects

General Outcome:

6.0 The students should be able to edit audio for multimedia titles.

Specific Learning Outcomes:

Upon successful completion of this unit, the students should be able to:

- 6.1 Open a file in audio software.
- 6.2 Cut, copy, undo, mix sound for multimedia.
- 6.3 Organize and edit playlist.
- 6.4 Process sound with sample rate, size, and channels.
- 6.5 Add effects.
- 6.6 Save file for inclusion in multimedia titles.

Unit 7. Importing Video and Sound into Multimedia Projects.

General Outcome:

7.0 The students should be able to import video and sound into multimedia titles.

Specific Learning Outcomes:

Upon successful completion of this unit, the students should be able to:

- 7.1 Import video into multimedia projects.
- 7.2 Import sound into multimedia projects.
- 7.3 Preview video and audio in the final project.
- 7.4 Edit, if necessary, for completion of the project.

Unit 8. Copyright Issues

General Outcome:

8.0 The students should be able to identify copyright issues in multimedia titles.

Specific Learning Outcomes:

Upon successful completion of this unit, the students should be able to:

- 8.1 Identify use of video and audio for multimedia project.
- 8.2 Define copyright use.
- 8.3 Identify educational and public domain copyright issues.
- 8.4 Explain how to obtain permission for using copyrighted media.