

# DC 417 W13 Syllabus

## Advanced Sound Mixing for Cinema Post Production

### WEEK 1: 1.07 Critical Listening: The Mix

The Elements of a Mix/Clip

Basic Mixing Terminology

Critical listening

Clips

Pro Tools Boot Camp

[Homework: Reading: Izhaki: Pages 3-74](#)

### WEEK 2: 1.14 The Process of Mixing

Critical listening

How do we listen to a mix? Clips.

Mixing vision, mixing analysis, reference tracks, the production chain, the mixing plan and objectives.

[Homework: Reading: Izhaki: Pages 77-98, 141-205,](#)

**Paper #1:** View a 30-minute scene from a movie (in stereo) of your choice and discuss the mix in a 1000 word paper. What is prominent? How does the mix aid in the narrative? What are the color choices? How would you describe the style of mixing? How is the sound field utilized? Why did the rerecording mixers end up with this mix? (12pt font double-spaced).

**Presentation:** Prepare a 15-minute lecture/demonstration on assigned topic (Due weeks 5-7)

## **WEEK 3: 1.21 Mixing and Pro Tools**

Critical listening

Template setup, signal flow, tracks, automation, send automation, side chaining, identifying track challenges, mixing goals, assigning channels.

Homework: Reading: Izhaki: Pages 206-250, 264-336.

**Project #1:** (Rough Mix due Week 4, Final Mix due Week 5): Complete a stereo mix for assigned movie.

## **WEEK 4: 1.28 Digital Signal Processes Part 1**

Critical Listening

**Quiz 1** - Based upon readings, lecture, clips, and lab experience from Classes 1 to 3. There will be a critical listening component.

Compression and equalization.

Homework: Reading: Izhaki: Pages 337-375, 382-398, 408-454

## **WEEK 5: 2.04 Digital Signal Processes Part 2**

Critical Listening

Limiting, gates, expanders, delays, Izotope RX and reverb.

Read, write, latch, and touch

Grad presentations.

Homework: Reading: **Creating a Balanced Surround Mix, Gain Structuring with Plug-ins, Ready, Set, Mix!, Surround Sound Mixing.**

**Paper #2:** View a movie of your choice in a commercial theater with 5.1/7.1 surround. Additionally, view the same movie where the theater is utilizing Dolby Atmos. Write a 1500- word paper on the use of surround in the mix and the differences between 5.1/7.1 surround and Dolby Atmos. (12pt font double spaced).

## **WEEK 6: 2.11 A History of Surround Sound**

Fantasia to Apocalypse Now to the current myths and realities of 7.1 surround Sound to Dolby Atmos.

Grad presentations

Homework: Reading: **Surround Sound, Surround Sound AES Specs.**

**Project #2:** Complete a 3-minute soundscape in surround. **Project #3:** Complete and deliver to DVD a surround mix of assigned short movie (Rough Mix due Week 9, Final Mix due Week 11).

## **WEEK 7: 2.18 Surround Sound Template setup**

Setup, monitoring.

**The Deadliest Catch**, a tour of a Pro Tools Session from the show.

Video: **Mixing Lost**

Grad Presentations

Homework: Reading: **Surround Sound Formats, The 5.1 Mix.**

**Project #3:** Complete and deliver to DVD a surround mix of assigned short movie.

## **WEEK 8: 2.25 Surround Sound Techniques Part 1**

Dynamic panning, sound field, center speaker functions, lfe functions, reflection, headroom issues.

Homework: Reading: **Sound Code for Dolby Digital Guide.**

**Project #3**

## **WEEK 9: 3.04 Surround Sound Techniques Part 2**

**Quiz 2** - Based upon readings, lecture, clips, and lab experience from Classes 4 to 8. There will be a critical listening component.

Software training: Neyrinck for Dolby Digital Surround and Dolby Media Meter

Homework: Reading: **Audio Video Specs, Mixing in the Round, Stem Files Explained, Writing Final Mixes**

### **Project #3**

## **WEEK 10: 3.11 Surround Sound Compression and Delivery**

Stems, prints, M&E

Current surround formats; Dolby digital encoding, encoding, error detection, and compression artifacts. Dolby surround, Pro Logic, THX, Audio Coding-3, Dolby Digital Ex, Dolby Digital Surround Ex, Blu-ray, DVD.

Homework: **Project #3**

## **WEEK 11: 3.18, 5:45pm Final Project Screenings.**

**Office: 600A**

**Office hours: Mon 2:30-5:30 or by appt.**

**Email: [rsteel@cdm.depaul.edu](mailto:rsteel@cdm.depaul.edu)**

**Course Description:** This workshop-based course offers advanced mixing techniques for Stereo and Surround Sound. Subjects include mixing philosophies, techniques, advanced digital signal processing, and monitoring. A history of Surround Sound and contemporary surround techniques will be covered. Several projects will be completed throughout the quarter.

**Course Objectives:** Students completing this course will have the ability to complete and deliver final stereo and surround mixes for Cinema.

**Prerequisites:** DC315

**Required Texts:**

Mixing Audio: Concepts, Practices and Tools (Second Edition) by Roey Izhaki

**Grading**

Quizzes: 10 points, Paper #1: 10 points, Paper #2: 15 points, Project #1: 15 points (Rough Mix: 5 points, Final Mix: 10 points), Project #2: 10 points, Project #3: 30 points (Rough Mix: 5 points, Final Mix: 25 points), Presentation: 10 points. A 93-100  
Excellent work A- 90-92 B+ 87-89 B 83-86 Above satisfactory work B- 80-82 C+ 77-79  
C 73-76 Satisfactory/good work C- 70-72 D+ 67-69 D 63-66 Unsatisfactory work D- 60-62 F 59-61 Substantially unsatisfactory work.

**Attendance**

Attendance is mandatory. Each class will include lecture, screening, discussion and software training. Missing a class or being late will be detrimental to the learning process.