

New Course Request

Indiana University

Indianapolis Campus

Check Appropriate Boxes: Undergraduate credit Graduate credit Professional credit

1. School/Division Informatics 2. Academic Subject Code NEWM-N
3. Course Number 455 (must be cleared with University Enrollment Services) 4. Instructor Brice Bowman
5. Course Title Advanced Sound Design

Recommended Abbreviation (Optional) _____
(Limited to 32 Characters including spaces)

6. First time this course is to be offered (Semester/Year): Fall 2010

7. Credit Hours: Fixed at 3 or Variable from _____ to _____

8. Is this course to be graded S-F (only)? Yes _____ No

9. Is variable title approval being requested? Yes No

10. Course description (not to exceed 50 words) for Bulletin publication: P: N355. Students design, record, and edit sound files, apply effects, and mix several audio projects using state-of-the-art technology. Topics include acoustics, circuits, waveforms, digital signal processing (DSP), and studio design and equipment. Emphasis is on practical techniques for integrating sound with other media.

11. Lecture Contact Hours: Fixed at 3 or Variable from _____ to _____

12. Non-Lecture Contact Hours: Fixed at 0 or Variable from _____ to _____

13. Estimated enrollment: 25 of which 0 percent are expected to be graduate students.

14. Frequency of scheduling: F/S Will this course be required for majors? _____

15. Justification for new course: Redesign of New Media Curriculum

16. Are the necessary reading materials currently available in the appropriate library? Yes

17. Please append a complete outline of the proposed course, and indicate instructor (if known), textbooks, and other materials.

18. If this course overlaps with existing courses, please explain with which courses it overlaps and whether this overlap is necessary, desirable, or unimportant.

19. A copy of every new course proposal must be submitted to departments, schools, or divisions in which there may be overlap of the new course with existing courses or areas of strong concern, with instructions that they send comments directly to the originating Curriculum Committee. Please append a list of departments, schools, or divisions thus consulted.

Submitted by: M. Pauline Behr Date 6/30/2009
Department Chairman/Division Director

Approved by: [Signature] Date 1 July 2009
Dean

Date _____
Dean of Graduate School (when required)

Date _____
Chancellor/Vice-President

Date _____
University Enrollment Services

After School/Division approval, forward the last copy (without attachments) to University Enrollment Services for initial processing, and the remaining four copies and attachments to the Campus Chancellor or Vice-President.

Advanced Sound Design N 455

Credits: 3 hours

Instructor: Brice Bowman
Office Hours: By Appointment
Office: Earshot Audio Post
Phone: 3178033727
Email: briowma@iupui.edu

Course Description

Students design, record, and edit sound files, apply effects, and mix several audio projects using state of the art technology. Topics include acoustics, circuits, waveforms, digital signal processing (DSP), and studio design and equipment. Emphasis is on practical techniques for integrating sound with other media.

Prerequisite

N355

Extended Course Description

This course provides an advanced understanding of Sound Design for picture and new media, building on and refining the knowledge and techniques learned in P355. Students will design, record, and edit sound files, apply DSP effects, and mix a variety of audio projects using stateoftheart technology in a working audio postproduction facility. Particular emphasis will be placed on learning advanced practical techniques in creating and manipulating original and hybrid sound assets for integration with other media. In addition to practical techniques, this course will provide a supportive knowledge base in acoustics, studio design and construction, studio equipment, AC/DC circuits, waveforms, microphone selection and characteristics, signal flow and gain staging, DSP (Digital Signal Processing), digital audio file formats, dynamics and mix levels for various media, and surround mixing as they relate to Sound Design. Also examined are the business behind Sound Design and the relationship of sound to visuals in storytelling.

Classroom: IT270 (Class/Lab), IT360 (Sound Lab), and Earshot Audio Post

Required Textbook:

Title A: Audio In Media, eighth edition
ISBN (10 Digits): 0495095680
ISBN (13 Digits): 9780495095682
Authors: Stanley R. Alten
Publisher: Wadsworth
Release Date: 2008 **Format:** Hardcover

Lab Projects: Appropriate systems are provided in lab as well as a working audio postproduction facility. Students will work in groups during inclass Studio Projects to learn the various roles in recording dialog, sound effects, ADR (Automated Dialogue Replacement), Foley, music editing, and mixing. **External Assignments:** Outside assignments will require access to computers with ProTools software/hardware installed, which will be completed in IT270 or the Informatics Sound Lab (IT360). See posted schedules for availability. Students are encouraged to acquire their own high quality headphones for audio monitoring in IT270. Please consult the instructor however, as poor headphones lead to poor mixes.

Course Objectives and outcomes: · Define and make comprehensible the parameters related to Sound Design · Provide an assessment and review of audio theory and practice – microphones, signal flow, audio equipment/specifications, AC/DC circuits, levels/dynamics, acoustics, frequency spectrum/response, DSP (Digital Signal Processing), and Surround mixing · Provide an introduction to the ProTools audio recording, editing, DSP, and mixing environment · Demonstrate and perform professional quality recording, editing, processing and mixing of voiceover, dialog/ADR, sound effects, Foley, ambience, and music · Discuss and demonstrate music selection and editing techniques · Demonstrate successful implementation of sound synchronization to picture (video) · Demonstrate successful sound placement techniques in various mix formats · Discuss and demonstrate the various human roles in the Sound Design Process

Audio Software Used: Digidesign ProTools

Optional: Cakewalk Sonar, Sound Forge

Other Software: Adobe Premiere, Photoshop, Encore DVD

Expectations/Guidelines/Policies: Class Attendance: Class Attendance is mandatory. Students are expected to be present for every class meeting. If you must miss a class due to illness, accidents, or death/serious illness in the family, you should notify the instructor as soon as possible via email. Each situation will be evaluated on an individual basis. If you cannot attend class for any other reason, please notify the instructor. § Attendance will be taken at the beginning of class. If you do not sign in at the beginning of class, you will be counted as absent. § Students are expected to use every class period for work; unless the instructor specifically indicates otherwise. § Students are expected to be in class for the entire duration of the class period unless dismissed by the instructor. § **If a student misses more than 3 class periods, each additional class period missed will deduct one letter grade on the final course grade.** § Missing class also affects participation, as does leaving class early or coming in late.

Late projects: Project will be deducted a letter grade per day late from the project grade

Participation: Students are expected to ask questions and pay attention during lectures, demonstrations, and Studio Projects. All work done in the class must pertain to class objectives. All other work is prohibited during the class period. **The use of instant messaging and playing of video games is strictly prohibited during the entire class period.** Students will receive only one warning. **If the student chooses to continue after the first warning, one letter grade will be deducted from the final course grade.**

Studio Projects: Students will be divided into groups and will rotate through various roles during the production process, including audio engineer, producer, director, and client. Following each project, groups will crosspresent and explain problems encountered during recording and how they arrived at solutions. All Studio Projects will be created and mixed in ProTools HD. External assignments will utilize ProTools LE.

Studio Project One: Students will record, EQ(equalize), compress, edit, and synchronize voiceover to a threeminute video, which will be provided. After the VO is synchronized to video, students will EQ, level, and compress the VO in preparation for final mixing.

Studio Project Two: Individual students will be assigned music tracks in various styles and given parameters for editing that music to various lengths. This project will encompass ProTools session setup, audio file import, editing and crossfade functions, and file export (bounce). Particular attention will be paid to musical continuity and quality of edits/crossfades.

Studio Project Three: Students will be responsible for selecting and editing library music for the threeminute video used in Studio Project One. Based on assigned creative parameters, students will be responsible for assessing music styles for various scenes, defining music transition points, selecting and importing music, and editing music cuts to length. Particular attention will be paid to musical continuity, transitions, and quality of edits/crossfades.

Studio Project Four: Students will synchronize sound effects to picture for a video, which will be provided. Groups will import video, spot sound effects, and develop a cue sheet during this phase of the postproduction process. Sound effects sources will be determined based the cue sheet and will be created and/or imported into the ProTools session. SFX will be positioned to picture, with particular attention paid to panning, acoustic perspective, environments, and relative levels.

Studio Project Five: Students will be responsible for casting and directing the recording of voiceover tracks for use in their Student Project 2. Working in rotation, groups will record, edit, level, EQ, compress and export the voiceover in the proper file format for use in individual projects.

Studio Project Six: In this project, we will record and synchronize (align) ADR (Automated Dialogue Replacement), record and align Foley, and add ambience to picture. Video will be provided for this project.

Studio Project Seven: This project will simulate the full audio postproduction process for commercial Sound Design. In Part 1, groups will record and edit VO, and select and edit music for a television commercial. Part 2 will encompass design and recording of SFX, Foley, ambience, and final mixing.

Studio Project Eight: This Final Group Project will encompass four weeks of studio work, utilizing all of the concepts and techniques learned during the course. Students will add Sound Design elements to the voiceover tracks and music edits completed in Studio Projects 1 and 3, culminating in a final mixtopicture.

External Assignments: Students will be expected to complete several external assignments, which will be completed outside of scheduled class time. Assigned reading and several papers will also be completed outside of class.

Grading and Assessment: Your grade will be determined by the following: · (6) Group Studio Projects 300 points · (1) Final Group Project 200 points · External Assignments 200 points · Class Participation/Attendance 200 points · Final Exam 100 points Total: 1000 points

OnCourse We will be using OnCourse for all class scheduling, communications, assignments, url links, email, grade postings, etc. This includes lecture dates, class assignments and due dates as well as class notes. You are expected to do class reading assignments prior to class sessions and retrieve any class notes made available through OnCourse prior to each class session.

Plagiarism (adapted from the definition by the School of Liberal Arts) Plagiarism is the use of the work of others without properly crediting the actual source of the ideas, words, sentences, paragraphs, entire articles, music or pictures. Using other students' work (with or without their permission) is still plagiarism if you don't indicate who initially did the work. Plagiarism, a form of cheating, is a serious offense and will be severely punished. When an instructor suspects plagiarism, he/she will inform the student of the charge; the student has the right to respond to the allegations. Students for this reason and as a protection in cases of lost papers, diskettes, retain rough drafts, notes, and other work products for 2 or 3 weeks after the end of each semester. The penalties for plagiarism include reprimands, being failed for a particular exam, paper, project or the entire course, disciplinary probation, or dismissal. Faculty, after consulting with their chair and/or the dean must notify students in writing of their decision. Students have a right to appeal such a decision by submitting a petition.

All students are responsible for reading the **Code of Student Rights, Responsibilities, and Conduct** of Indiana University Purdue University Indianapolis. Instructor reserves the right to modify the content of the syllabus at anytime in the course of this semester. "Children are not permitted to attend class with parents, guardians, or childcare providers. This conduct has the effect of unreasonably interfering with an individual's work or academic performance creating an offensive learning environment." "A student must not violate course rules as contained in a course syllabus, which are rationally related to the content of the course or to the enhancement of the learning process in the course."