



New York City College of Technology
 Entertainment Technology Department
 186 Jay Street V-205, Brooklyn, NY 11201
 (718) 260-5588 Fax (718) 260-5591

ENT-1270 Sound Technology, Section 6227

2014 Spring Semester
 Instructor: Bruce Ellman
 Office: Room 205, Voorhees Hall, (718) 260-5588
 Email: bellman@citytech.cuny.edu

Class Meeting Time:

Monday & Wednesday, 2:00 – 3:40pm

Course Description:

ENT1270 is an overview of the basic properties of sound, its characteristics, fundamental concepts, and problems. Students will learn both to understand and hear these basic components of sound. Hard disk recording systems on the Macintosh computer platform are introduced. The concepts of audio (as opposed to sound), storage, playback and reinforcement are introduced. Students will learn good audio working practices, and how to understand audio paperwork and be able to assemble small systems based on that paperwork. Students will begin to assemble the personal tools required for professional work.

Students who successfully complete this course will be able to:

- Describe basic sound and audio concepts including, frequency, phase, amplitude and dB
- Implement basic live sound systems with proper gain structure
- Identify and differentiate key parts of a sound system
- Compare and contrast the differences between types of sends on a mixing console (pre and post fade, aux, etc.)
- Operate basic audio editing software
- Describe the way that hearing works
- Calculate Nyquist frequency
- Describe an octave and calculate how it changes in frequency
- Describe simple harmonic motion.
- Describe the difference between dynamic and condenser microphones
- Recognize and identify different microphone patterns.
- Describe what feedback is, and suggest different ways to eliminate or minimize it.
- Differentiate between different types of audio connectors
- Describe phantom power and recognize when it should be used.

Attendance/Promptness:

If you have a legitimate reason for missing a class/assignment or if you will be late, you must contact me (see above) before class begins. It is NYCTC policy that if you have three unexcused absences, you will fail the class.

Grades:

Your grade will be determined as follows:

Final Exam	24%
Midterm Exam	24%
Labs/Assignments/Quizzes	42%
Class participation, Attitude, Attendance	10%

NOTE: If you miss a quiz or test due to an unexcused absence, you will receive a zero for that test or quiz, and you must propose an extra credit project as a make-up. Quizzes are typically given to ensure that you do the reading, and may contain questions not covered in class. Do the reading!

Please see the departmental guidelines regarding grade policy, academic integrity, production attendance policy, minimum work hours outside the classroom, etc.

Tentative and Subject to Change

Required Text:

Live Sound Reinforcement – Scott Hunter Stark—ISBN 0-918371-07-04
Web and other readings as assigned

Note: It is highly recommended that you do the reading for a particular class date BEFORE the class. This will help you be prepared to ask questions during the appropriate lecture. Sometimes, I will assign a reading from a section that has already been read: this occurs when we more specifically cover a topic. I do this to help you have a second chance at covering a difficult or important topic

Required Tools

Throughout your career as a student in the entertainment technology program, you will be required to add to an inventory of tools. By this time should already have a flashlight and multi-tool at a minimum.

Additional tools which need to be purchased immediately include:

- Earplugs
- USB Memory stick 4gb or greater
- Headset, capable of 1/4" and 1/8" connection
- Music CD for playback