MUT 305 Advanced Microphone Techniques

SPRING 2016

Instructor: Dr. Kelleher (Pro Tools Expert: Music; Pro Tools Operator: Post)
Email: KelleherKD@sfasu.edu
Phone: 936-468-1116
Office: Music Building, Room 270
Credits: 2

Office Hours: T 1:30-3pm, W 11-11:50am, or by appointment

Class Meetings: MW from 3:30-4:20pm in the SRT Lab, Rm. 302 in Griffith, or Encore
Recording Studio (see Course Calendar)

Course Description:

Prerequisite: MUT 205 Microphone Techniques
Corequisite: MUT 220 Essentials of Audio Technology

This course is designed to build on the microphone techniques learned in MUT 205. Students will study the art and science of utilizing microphones to record various instruments and voices in the studio and on location, acquiring this expertise using different microphones and recording equipment housed at SFA and Encore Recording Studio. Topics to be covered include advanced microphone techniques, the various types of microphones used in the recording studio and on location as well as stereo and multi-microphone placement techniques. Students will complete projects that enhance their understanding of various advanced microphone techniques used to capture the sound of different ensembles.

Program Learning Outcomes:

1. Student will demonstrate the ability to hear, identify, and work conceptually with the melodic, harmonic and rhythmic elements of music.
2. Student will deliver an academic presentation that demonstrates oral and written language skills, citations, analysis, musical examples and organization.
3. Students will demonstrate their understanding of current trends in popular music by recording songs with various microphones.
4. Students will rehearse musical material for and perform on recorded projects.
5. Students will demonstrate a working knowledge of popular music history and literature.

**Student Learning Outcomes:**

After successfully completing this course, students will be able to:

| ▪ Record various ensembles | ▪ Demonstrate a working knowledge of frequency |
| ▪ Understand the differences between recording in the studio vs. on location | ▪ Understand advanced audio signal flow |
| ▪ Demonstrate advanced microphone placement techniques | ▪ Mic a wide variety of ensembles |
| ▪ Understand the acoustic effects of indoor vs. outdoor locations | ▪ Utilize stereo and multi-microphone techniques |

**Text and Materials:**

1. Textbooks:  
   1) *The Recording Engineer’s Handbook* (Third Edition) by Bobby Owsinski  
   2) *The Microphone Book* (Second Edition) by John Eargle  
      *(This book is in the SRT Lab for your reference)*
   3) *Recording On The Go* by Gary Gottlieb and Paul Hennerich  
      *(This book is in the SRT Lab for your reference)*

2. Key for entry into the SRT Lab. See Missy Devine in the Music Office (Rm. 150).
3. Headphones with a ¼” adapter.
4. Flash drive to backup projects.

**Optional Suggested Further Reading:**

- *Practical Recording Techniques*, 4th Edition by Bruce and Jenny Bartlett
- *Recording Tips for Engineers*, 2nd Edition by Tim Crich
Course Requirements:

1. **Lab Time**: Students must sign up for hourly lab time slots.

2. **Projects**: Projects will be listened to in the beginning of class as well as evaluated by peers and/or turned in on CD for grading.

   *Late projects will receive a zero. Students must also be present in class for their projects to be played and assigned grades.*

3. **Presentation**: Students will deliver an academic presentation on an instructor-approved topic. *Late or missed presentations will be assigned a zero.* Students are also required to assemble a professional-looking binder of all presentations.

4. **Final Exam**: One-on-one timed exam that demonstrates mastery of advanced microphone techniques.

Course Calendar:

<table>
<thead>
<tr>
<th>Week 1:</th>
<th>1/20 W: Class Intro and Syllabus, Studio and Classroom Policies, Presentation Guidelines, and Pro Tools Exam Review</th>
</tr>
</thead>
<tbody>
<tr>
<td>Week 2:</td>
<td>1/25 M: Pro Tools Exams</td>
</tr>
<tr>
<td></td>
<td>1/27 W: Pro Tools Exams</td>
</tr>
<tr>
<td>Week 3:</td>
<td>2/01 M: Research Day</td>
</tr>
<tr>
<td></td>
<td>2/03 W: Pro Tools Exams</td>
</tr>
<tr>
<td>Week 4:</td>
<td>2/08 M: Encore Recording Studio</td>
</tr>
<tr>
<td></td>
<td>2/10 W: Presentation 1</td>
</tr>
<tr>
<td>Week 5:</td>
<td>2/15 M: Wire Road Studios Field Trip</td>
</tr>
<tr>
<td></td>
<td>2/17 W: Encore Recording Studio</td>
</tr>
<tr>
<td>Week 6:</td>
<td>2/22 M: Encore Recording Studio</td>
</tr>
<tr>
<td></td>
<td>2/24 W: Presentation 2</td>
</tr>
<tr>
<td>Week 7:</td>
<td>2/29 M: Encore Recording Studio</td>
</tr>
<tr>
<td></td>
<td>3/02 W: Encore Recording Studio</td>
</tr>
</tbody>
</table>
**Course Calendar (cont.):**

**Week 8:**  
3/07 **M:** Encore Recording Studio  
3/09 **W:** Presentation 3  
**Week 9:**  
3/14-18: **No Class** – Spring Break  
**Week 10:**  
3/21 **M:** Encore Recording Studio  
3/23 **W:** Presentation 4 & Advising  
**Week 11:**  
3/28 **M:** No Class – Easter Holiday  
3/30 **W:** Encore Recording Studio  
**Week 12:**  
4/4 **M:** Encore Recording Studio  
4/6 **W:** Pro Tools Review  
**Week 13:**  
4/11 **M:** Pro Tools Exams  
4/13 **W:** Pro Tools Exams  
**Week 14:**  
4/18 **M:** Pro Tools Exams  
4/20 **W:** Pro Tools Exams  
**Week 15:**  
4/25 **M:** Pro Tools Exams  
4/27 **W:** Pro Tools Exams  
**Week 16:**  
5/2 **M:** Pro Tools Exams  
5/4 **W:** Pro Tools Exams  

**Final Exam:** **Monday, May 9th, 2016 from 4-6pm**

***** The final project is due at the beginning of your final exam time slot *****

**Grading Policy:**

1. Projects: 20%  
2. Presentation & Presentation Binder: 35%  
3. Participation: 20%  
4. Final Project: 15%  
5. Final Exam: 10%

**Grading Scale:**

<table>
<thead>
<tr>
<th>Grade</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>90-100</td>
</tr>
<tr>
<td>B</td>
<td>80-89</td>
</tr>
<tr>
<td>C</td>
<td>70-79</td>
</tr>
<tr>
<td>D</td>
<td>60-69</td>
</tr>
<tr>
<td>F</td>
<td>59 &amp; Below</td>
</tr>
</tbody>
</table>
Attendance Policy:

This course thrives on engaging discussions and interactive lectures that are vitally important to your success in this class, program and career. It is therefore very important that you arrive on time and are present for the entire class period, as I will not provide out-of-class one-on-one lessons pertaining to information missed due to absences. While you are all adults and make your own decisions as well as deal with the consequences thereof, missing class will affect your participation grade and cause you to lose out on vital information, crucial discussions and pertinent activities that will help improve your technical skills, critical thinking skills and, of course, your class average. Please note that university policy dictates that upon your fifth absence you will automatically receive an “F” for the course.

As was noted in the course requirements section, weekly projects will be listened to at the beginning of class, and quizzes will be given and timed at the beginning of class. If you are not in class for these events, you will earn a zero for that work. Additionally, if you arrive after attendance has been taken, you are responsible for informing me that a change in your status needs to be made (but, please, wait until the end of class).

Participation is 20% of your overall grade and a key element of the course. Everyone is expected to actively participate in class and finish any required homework assignments. Please be respectful of your peers and phrase your discourse in a pleasing tone that is respectful and free of derogatory language. Exceedingly obscene words or acts could get you thrown out of class: Physical confrontations will get you thrown out. Keep in mind that everyone has a different background, has something unique to offer and may offer a perspective that contributes to your understanding of the material. Always remember that a difference in opinion is not an excuse for rude behavior!

NO LATE PROJECTS OR PRESENTATIONS ARE ACCEPTED. EXCEPTIONS WILL BE MADE IN THE CASE OF A UNIVERSITY ACCEPTED EXCUSE (ILLNESS OR EMERGENCY), AS LONG AS SUPPORTING DOCUMENTATION IS PROVIDED TO THE JUDICAIY OFFICE AND IS SUBSEQUENTLY PROVIDED TO ME.

LIKEWISE, RESCHEDULING OF EXAMS IS POSSIBLE ONLY IN THE CASE OF DOCUMENTED UNIVERSITY-SPONSORED ATHLETIC OR ACADEMIC FUNCTIONS AS WELL AS DOCUMENTED ILLNESSES OR EMERGENCIES.
Cell Phones, PDAs, IPods, Etc.:
Any electronic device designed for communication should be turned off or placed on silent mode before class begins. If your cell phone inadvertently rings, turn it off ASAP!! If there are extenuating circumstances that require your cell phone to be on, please inform me before class. If I notice you using any of these devices without permission, you will be docked participation points and risk being dismissed from class.

Obtaining Help:
If you do not understand certain project instructions, have questions you feel uncomfortable asking in class or encounter any other difficulties, the right time to seek help is long before any assignment is due. Please make an effort to take advantage of my office hours, make an appointment, call or compose a concise, easy-to-answer email after you have reread any pertinent material related to the assignment.

Email Correspondence:
Any emails relating to this course must be sent from your SFASU email account, and the subject line must read MUT 305. Keep in mind that I will not accept assignments via email, especially research papers. If you would like to discuss sensitive matters, such as grades, through email, you must ensure that I have a signed letter authorizing me to send information through this potentially unsecure medium. As with any written document, please proofread your email before you send it to me. Strive to write professionally and concisely, including only relevant information.

Course Evaluations:
You are encouraged to evaluate this course electronically. It is important for me to have feedback in order to know what you find helpful and make further improvements to the course. Thank you very much in advance.

Academic Integrity (A-9.I):
Academic integrity is a responsibility of all university faculty and students. Faculty members promote academic integrity in multiple ways including instruction on the components of academic honesty, as well as abiding by university policy on penalties for cheating and plagiarism.

Definition of Academic Dishonesty
Academic dishonesty includes both cheating and plagiarism. Cheating includes but is not limited to (1) using or attempting to use unauthorized materials to aid in achieving a better grade
on a component of a class; (2) the falsification or invention of any information, including citations, on an assigned exercise; and/or (3) helping or attempting to help another in an act of cheating or plagiarism. Plagiarism is presenting the words or ideas of another person as if they were your own. Examples of plagiarism are (1) submitting an assignment as if it were one's own work when, in fact, it is at least partly the work of another; (2) submitting a work that has been purchased or otherwise obtained from an Internet source or another source; and (3) incorporating the words or ideas of an author into one's paper without giving the author due credit.

Please read the complete policy at [http://www.sfasu.edu/policies/academic_integrity.asp](http://www.sfasu.edu/policies/academic_integrity.asp)

**Withheld Grades Semester Grades Policy (A-54):**

Ordinarily, at the discretion of the instructor of record and with the approval of the academic chair/director, a grade of WH will be assigned only if the student cannot complete the course work because of unavoidable circumstances. Students must complete the work within one calendar year from the end of the semester in which they receive a WH, or the grade automatically becomes an F. If students register for the same course in future terms the WH will automatically become an F and will be counted as a repeated course for the purpose of computing the grade point average.

**Students with Disabilities:**

To obtain disability related accommodations, alternate formats and/or auxiliary aids, students with disabilities must contact the Office of Disability Services (ODS), Human Services Building, and Room 325, 468-3004 / 468-1004 (TDD) as early as possible in the semester. Once verified, ODS will notify the course instructor and outline the accommodation and/or auxiliary aids to be provided. Failure to request services in a timely manner may delay your accommodations. For additional information, go to [http://www.sfasu.edu/disabilityservices/](http://www.sfasu.edu/disabilityservices/)

**Classroom Policies:**

*Decreed by KelleHertz:*

1. Do not communicate with another person when I am talking.
2. Do not communicate with someone else while your colleagues are talking.
3. If you have a question, please do not ask it to someone else in class. Respectfully get my attention and ask me your question!
• Do not miss class. If you must miss class, be courteous and let me know in advance that you will be absent.

• If you are missing class because of a university-accepted excuse, you will be allowed to make up any missed work at a later, mutually agreed upon date.

• If you are sick, go see a Doctor. When you do, obtain documentation and submit it to the judicial committee. If you do not see a Doctor and do not acquire the appropriate documentation, the University does not consider your illness to be an acceptable excuse.

• Do not be late to class. It is disruptive and rude. Consider ascribing to the following philosophy: “If you are five minutes early, you are on time. If you are on time, you are late.”

• Class starts promptly at 3:30pm. **Reminder: If you are late to class, you will not be allowed to deliver your presentation. Missed presentations will receive a zero.**

• If you must be late to class, let me know in advance.

• If you are late to class because of a university-accepted excuse, you will be allowed to make up any missed work at a later, mutually agreed upon date.

• If you have some issue that is preventing you from arriving to class on time, please discuss it with me so we can determine if your tardiness is reasonable or not. Having to wait in line at Starbucks, for example, is not reasonable.

• You, and you alone are responsible for taking the initiative to provide acceptable excuses and to make up any work you missed as a result of a university-accepted reason.

• Do not text while you are in class. It is uncouth.

• Do not use your laptop to chat, email, surf the web, etc. or listen to your iPod while you are in class. This is rude. You may, however, use your laptop to take notes during class.

• Do not engage in conversations with your classmates or partake in any other activity that might appear to be disrespectful. If you have a question, ask me and not your classmates!

• In short, if you violate any of the University’s policies, which includes violating either my classroom policies or the School of Music’s facility policies, you may be automatically withdrawn from this course, barred from the SRT Lab, and/or reported to the Honor Council, which has the ability to discipline, expel, or take legal action against a student.
SRT Lab Policies:

The Sound Recording Technology Lab is a Stephen F. Austin State University facility and your use of as well as your conduct in this facility is bound by University policies and regulations. Violations of any of the following rules are grounds for immediate automatic withdrawal from the course. Please use common sense and good judgment.

• **Get permission to bring other people into the SRT Lab.** In general, only students currently taking SRT courses should be in the lab. If you wish to record someone who is not enrolled in an SRT course, record him or her somewhere else and import the audio into your session. If this is not possible, you may request permission to bring someone into the SRT Lab by submitting an SRT Lab Guest Form (found online: Desire2Learn).

• **Do not eat, drink** (including candy or gum) **or smoke**, etc. in the SRT Lab.

• Online calendars will be used for reserving lab time. Do not sign up for more than six (6) hours per week, and no more than two (2) consecutive slots. If you cannot use the time(s) you reserved, please send an e-mail to SRT@SFASU.EDU to have your reservation removed by an SRT student worker so that others may use the time.

• **Do not go over the time you signed up to work when someone else is signed up and waiting to use the workstation you are using.** Whoever is signed up has first priority. Always be courteous to your classmates!

• **Do not let others use your key to the SRT Lab.** If you lose your key, alert an SRT student worker and someone in the Music office immediately. Anyone who loses their key is responsible for paying the fee to have the lock changed and new keys made.

• Log in and out of the SRT Lab by **signing the Log Book** for each session you attend.

• If you are the last person leaving, make sure all lights and equipment power has been turned off, gather all of your possessions and ensure that the door to the SRT Lab is securely shut behind you and locked.

• **Be very careful when rearranging equipment/cables or changing software settings/system preferences.** At the end of your session, make sure to return everything to its original/default state. If you have certain gear you would like to use, please obtain permission from me.
• In general, do not use the equipment for anything other than course-related activities. If you want to work on a personal project, do it when no one else is signed up to work on something course-related. You may not use the sign-up sheets for personal projects. In other words, DO NOT sign up for anything other than course-related work!

• Do not use the Internet or load any software on the workstations. Use the SFA computer labs on campus if you need to visit help sites for Pro Tools or for research related to the course.

• You MUST use headphones if someone else is in the SRT Lab. Do not ask others if it is OK, because they will usually say “yes” even if they really want to say “no” to avoid confrontation. It is unfair and unprofessional to put others in that position.

• BACK UP YOUR WORK!!! You are responsible for saving your work. Adhere to the following philosophy: “If your project is not saved in three different places, it does not exist!” Your project should be saved on a workstation in the studio, a flash drive that you bring to class and a computer or external hard drive outside the studio.

• Do not procrastinate. Do not wait until the last minute to work on your projects. The equipment is electronic and may have a problem, facility access may be an issue, someone may have messed something up despite the warning above not to do so and you may not be able to get an SRT student worker to help you, etc.

• Students that show an exemplary attitude, commitment to academic excellence, responsible and mature behavior or who acquire competency quickly may be allowed special privileges such as extended studio access, employment opportunities, etc.

• Do not be afraid to ask questions. Feel free to call me between 8am-7pm (Cell: 757-593-2891 – Always try to ask an SRT student worker first!). If I do not answer, please leave me a message describing your problem and be sure to clearly state your name and phone number. Text messages are also permitted.
Directions to Encore Recording Studio:

Physical Address: 706 N University Dr
Nacogdoches, TX 75961

Phone: 936-569-1485

From the Music Building: 1. Turn Left onto North St.
2. Turn Left onto Starr Ave (stop light).
3. Turn Right onto University Dr (stop light).
4. Turn Left into the Encore Music Parking Lot
   (Look for Napa Auto Parts on Your Left. Encore
   Music is very close to this store.)