

GTA: Melissa Jones

Email: jones.497@wright.edu
melissa.memo@gmail.com

Office Hours: 2:00 - 3:00 PM Tuesdays & Thursdays Russ 220

Contact/Communication: If for some reason you cannot meet with me during my scheduled office hours, please email me with your questions/concerns. I routinely check my email at least once a day. You may also use email to schedule an appointment outside of my normal office hours.

If you use a different email account than your university account, be sure that your WSU email is being forward to your other email address.

Lab Times:	Section 03	Monday	4:10 PM - 5:50 PM	203 RC
	Section 01	Wednesday	2:20 PM - 4:00 PM	203 RC
	Section 02	Friday	9:45 AM - 11:25 AM	203 RC

Laboratory Course Description: The Biomedical Electronics Laboratory provides practical experience with biomedical electronic circuits and measurements. Each student is required to keep a lab notebook to answer pre-lab questions, record procedures, measurements, calculations, and results. Even though the labs may be performed by teams of two students each, all lab reports, notebooks, and quizzes will be graded individually. All reports and notebooks and an electronic version of the report are due one week following the scheduled lab. The pre-lab and post-lab answers should be attached to the report.

Lab Groups: Lab groups for BME 460 are **limited to 2 people per group.**

Attendance: Attendance at each lab session is **mandatory**. Unexcused absences will result in a **zero grade** for all parts of that associated lab. Similarly, failure to attend any previously scheduled lab make-up session without prior notification will also result in a **zero grade**. **Known or planned absences should be coordinated with me by email.** Extenuating circumstances may occur that warrant exclusions from these guideline and will be handled on a case-by-case basis. Also please note since this lab is taught during the Winter quarter, school may be cancelled due to inclement weather on lab days. Students are expected to make up these missed labs.

Labs: The lab experiments in BME 460 have the same general format for lab requirements. There are nine labs overall (Week 2 - Week 10). Each lab will carry equal weight with a total of 100 points per lab. A grading **rubric** will be provided for each lab that gives the point breakdown (for a total of 100 points) for that particular lab.

Late Penalty: Late submissions will incur a penalty at a rate of 15 points per day.

Lab Notebook: You are **required** to keep a lab notebook; however, this lab notebook will not be collected but will be graded at the beginning of each lab. The requirements for lab notebook will be discussed during the first lab session.

Grades: The laboratory grade will be based on weekly lab reports, pre-lab assignments, quizzes, notebooks and a final practical exam to be given at the end of the quarter during final exam week.

Laboratory Grade	Points
Laboratory Reports (9 @ 100 points)	900
Pre-lab (9 @ 25 points)	225
Notebook (9 @ 10 points)	90
Quizzes (9 @ 15 points)	135
Final Practical Exam	<u>150</u>
Overall Total Points	1500

Your final laboratory grade will be calculated based on a total of 1500 possible points, and is worth 20% of the overall grade for BME 460..

Lab Days	Assignment
Jan 9/11/13	Lab 1: Laboratory Equipment for Measurement
Jan 16*/18/20	Lab 2: ECG Measurements
*Monday January 16 th , 2012	Martin Luther King Holiday - Need to make-up the Lab on an ad-hoc basis.
Jan 23/25/27	Lab 3: Passive Filters
Jan 30 Feb 1/3	Lab 4: Diodes
Feb 6/8/10	Lab 5: Bipolar Junction Transistor (BJT)
Feb 13/15/17	Lab 6: Operational Amplifiers
Feb 20/22/24	Lab 7: Active Filters
Feb 27/29 Mar 2	Lab 8: Operational Amplifier Applications
Mar 5/7/9	Lab 9: Digital Logic Circuits

Lab Final: Sign-up times for the scheduled final lab exam are first-come, first-served.
Only 8 students per section!

Monday, March 12, 2012

8:30 AM - 10:30 AM

10:45 AM - 12:45 PM

5:45 PM - 7:45 PM

8:00 PM - 10:00 PM

Wednesday, March 14, 2012

8:30 AM - 10:30 AM

10:45 AM - 12:45 PM

Essential Elements of BME 460/660 Laboratory Reports

Preparation

Choose a lab partner (same partner for the entire quarter).

Read the laboratory manual regarding the objectives and instructions prior to coming to the lab.

Complete the pre-lab questions (with your answers preferably typed) prior to coming to the lab.

Laboratory Procedures

Data may be the same for both partners but the lab reports should be written individually.

Don't share your results! Doing such is a violation of the University's Academic Integrity Policy.

See the **Academic Integrity** section below.

Notebooks

Will be checked prior to each lab.

Should contain the answer to the pre-labs, notes, circuits (with actual values), calculations, and results of the previous lab.

Laboratory Report Format

Lab report format will vary from week to week, depending on the nature of the lab experiment(s).

Refer to the grading **rubric** for each lab for specific instructions on how to complete the lab report.

See the attached sample *Biomedical Electronics Laboratory Report* cover sheet.

Academic Integrity: The course instructor and the laboratory instructor fully endorse the Wright State University policy to uphold and support standards of personal honesty and integrity for all students consistent with the goals of a community of scholars and students seeking knowledge and truth <http://www.wright.edu/students/judicial>. Although the laboratory exercises are meant to be a collaborative effort between team partners, they are not meant to be group exercises among teams. Equipment set-up, measurements, and data collection are a shared responsibility; laboratory notebooks and laboratory reports are intended to be individual efforts. References (books / internet resources) that were used in preparing the report must be clearly cited; or else a grade F will be given for that lab. If you have any questions whatsoever, please ask your laboratory instructor for additional/clarifying guidance. **Compliance with the WSU academic integrity policies is an individual student responsibility.**

For this class, you will submit all of your lab reports and code to Turnitin for review.

<http://www.turnitin.com>. Please refer to the *TurnItIn* handout for specific guidance and procedures.