

# 152L Syllabus

**Course:** 152L, Section \*, Group \*, E&M, Fall 2009

**Lab Schedule:**

**TA:**

**Office:**

**Office Hours:**

**E-Mail:**

**Office Phone #:**

## **Preparation for the lab:**

Use two notebooks – On the book's front cover print your name, class, section, and name of your TA. Also write table of contents at the beginning of each book, and have the pages numbered prior to use.

Use a **pen** for all reports/quizzes. Scientific Calculator. Lab manual. Ruler.

## **Format of Report:**

1). Write the experiment's title and your partners' name/s.

**Notes:** Write and explain any derivations of formulas you used in this experiments as well as assumptions we made to modify these formulas. (these are not the lecture notes!)

**Objectives:** The purpose of the lab. The objective part should be very short; it should not be longer than two-three lines. Write it in your own words.

**Procedure:** Write in your own words each step of your experiment. Do not copy the procedure from the lab manual. Draw a sketch of any apparatus used in this experiment.

**Data input:** Will include tables, graphs (*Before printing any graph ask your TA to check the plot*), and charts properly labeled with units. Please **staple** all extra papers to your notebook. The data should contain the information that was given and measured during the experiment (radii, current, voltage, resistance, etc.).

**Calculations:** Transform your data into results. **DO NOT ERASE!** Write the formulas you are going to use in your calculation, explain what is that formula for, and then use it. Write **UNITS** for all physical quantities!!!!

**Final Results:** Write your final results as follows: Result +/- Uncertainty.

**Discussion of errors:** Discuss the *systematic/random* errors involved in your experiment.

**Conclusion:** Write a conclusion in your own words. Explain whether the experiment fulfilled its objectives.

**Questions:** Answer the homework questions assigned at the beginning of every class.

## **Grades:**

**Lab Report – 60%:**

Each student must perform **all** experiments.

Reports must be handed over to your TA at the beginning of each lab. (During or after lab will be considered as late). Working on previous lab report in class is strictly prohibited.

Penalties for late reports:

late – 15% off.

1 week – 30% off.

2 weeks – 45% off.

3 weeks – 60% off.

4 weeks – The report will not be accepted.

Quizzes – 40%:

A ten to fifteen minutes quiz may be given weekly.

It will contain questions from the current lab and/or the previous lab/s.

Be prepared for those quizzes by reading the relevant chapters from your manual.

**Cheating:**

No cheating/copying is allowed.

**Each student will analyze lab data and answer quizzes by his/her own.**

A student who were caught cheating would be given a zero for that lab/quiz and report to the department for further discussion (may lead to a direct fail of the course).

**Missed Labs:**

To receive a full credit, a student must inform (email or call) his/her TA before or immediately after the missed lab. TA will arrange the make-up lab in another session. Lab notebook/data chart should be signed by the TA in charge of the make-up session, and lab report should be submitted to your own TA.