PHYSICS 291-2-3 (Bachelor's Thesis Project)

General Guidelines and Schedule (2006-07)

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For acceptance into the program, we will require from you a one-page typewritten abstract which (1) describes the project you intend to pursue, (2) briefly describes the physics of the problem, (3) outlines - to the extent that you know at this early stage - what your strategy will be in investigating the problem, and (4) names the faculty member who will be your thesis adviser (by the Spring Quarter, a co-reader must also be engaged). The thesis adviser should read the abstract before you give it to us, and he or she must sign the consent form (see attached). These materials must be submitted to Ms. Nobuko McNeill at the Department Chairman’s Office (KPTC 201) no later than Friday, October 20. If you are interested in participating in the project but need to find a thesis adviser, you should contact one of us for help.

In the Autumn and Winter Quarters we will get together to hear 20- to 30-minute presentations by all students. Your presentation will serve to introduce us all to the physics of your research problem, to permit us to understand and criticize your strategy, and to give you experience in scientific reporting. In the Spring Quarter, the presentations will be a full description of the problem and the results; this meeting must be attended by your adviser. Attendance at these presentations by all students in the program is mandatory.

Your written thesis, of no more than 20 pages, will be due at the beginning of the 7th week of the spring quarter. So that we can give you early feedback on your writing, you will hand in a partial thesis at the end of the fall and winter quarters. In the fall, it should be no more than 5 pages, containing a description of the science you are going to do and a coarse outline of the rest of the thesis. It should indicate the related work that motivates the project, with some references. In the winter, it should be no more than 10 pages. The introductory material should be nearly complete with adequate references to related work. It should also include a description of your apparatus and/or the technique you are using.

The schedule for the year will look approximately like this:

Autumn Quarter:
   Week 1 or 2   Organizational meeting
   Oct. 20      Abstracts and advisers' signatures due
   Weeks 6-7    progress oral reports
   Week 10      Written report as described above

Winter Quarter:
   Weeks 6-7    Progress oral reports
   Week 10      Written report as described above

Spring Quarter:
   Week 7       Written thesis due Monday
   Weeks 8-9    Final oral presentations