UNIVERSITY OF SYDNEY
SCHOOL OF GEOSCIENCES

HONOURS IN THE DIVISION OF GEOLOGY & GEOPHYSICS
(last updated March/4/2008 1:44 PM)

PROGRAM COORDINATOR:    Dr. Peter Cowell
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                           9351 2189

PROGRAM REQUIREMENTS:

The following requirements apply to all honours students supervised by staff within the Division of Geology and Geophysics, irrespective of the honours unit of study that they are enrolled in (e.g. geology, geophysics, marine science, environmental science).

The program consists of two parts:

1. Research and examination by thesis, including
   • seminars on research
   • submission of a research proposal and literature review;
   • submission of the completed thesis, according to the requirements laid out below; and
   • presentation of a public seminar on the scientific results of the thesis.

2. Course work, including
   • formal and informal course electives; and
   • attendance at all programmed Divisional seminars and other talks, conferences, workshops, etc., as advised by your supervisor or the Fourth Year Coordinator during the year.
SEMINARS ON RESEARCH
These seminars are designed to get you started, and to allow us to brief you on School resources at your disposal. The seminars are compulsory (but consult Peter Cowell if you have any problems with the times).
Location: Room 331, Madsen Building

<table>
<thead>
<tr>
<th>Date</th>
<th>Time</th>
<th>Seminar Title</th>
<th>Speaker/s</th>
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<tbody>
<tr>
<td>Tuesday March 4</td>
<td>10-12:00</td>
<td>Introduction to the Honours program</td>
<td>Peter Cowell, Bill Pritchard</td>
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<td>1-3:00</td>
<td>Research in Geosciences: the so what’s</td>
<td>Dan Penny</td>
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<tr>
<td>Thursday March 6</td>
<td>10-12:00</td>
<td>Writing Research Proposals &amp; Honours Theses</td>
<td>Angela Ardington, Learning Centre</td>
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<td></td>
<td>1-3:00</td>
<td>IT Skills for Writing a Thesis</td>
<td>John Twyman</td>
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<tr>
<td>Tuesday March 11</td>
<td>10-12:00</td>
<td>Moved to Thursday morning</td>
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<td></td>
<td>1-3:00</td>
<td>‘The Research Game’</td>
<td>Stephen Gale</td>
</tr>
<tr>
<td>Thursday March 13</td>
<td>10-12:00</td>
<td>Research Proposal Workshop</td>
<td>Angela Ardington, Learning Centre</td>
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HONOURS THESIS:
The thesis must not exceed 80 pages all inclusive of text, plates, figures and tables; but excluding references and appendices. The body of the thesis, excluding references and appendices, must be less than 18,000 words and a signed page at the front of the thesis must declare this. This does not imply that all theses should contain 80 pages and be 18,000 words in length; that figure should be treated as an absolute maximum. A soft copy of the text of the thesis must be submitted at the same time as three hard copies, spiral bound. For archival purposes, a CD-ROM that includes all the honours theses will be scored. You are encouraged to submit soft copies of as many figures, tables and appendices as possible for this purpose. All thesis materials must be submitted to Belinda McMillen, Geosciences front office, R. 350, Madsen Building.

The thesis should consist of the candidate’s own results obtained during the year, both in the field and in the laboratory, along with a discussion of their significance. It is expected that geological theses based on a field project will be divided into chapters on the major topics, such as geomorphology, stratigraphy, sedimentary petrology, igneous petrology, metamorphic petrology, structure etc., and conclude with a synthesis of the geological history of the area studied. Extensive analytical or other data should be set out in one or more appendices. One appendix must contain a list of all specimens referred to in the thesis, along with an indication of their exact field location using standard grid references. Samples of all specimens referred to in the thesis are to be lodged for addition to the School’s catalogued collections.

Theses that are based largely on laboratory work or specialised topics in geology and geophysics, or theses that are multi-disciplinary (e.g. marine or environmental science), will be divided into chapters on the main themes of the particular investigations. In these cases you should seek guidance from your supervisor.
Presentations

Students are expected to make two presentations during the Honours year: a presentation of research objectives and proposed methodology at the beginning of the year, and a final presentation of the results of their thesis. Final presentation marks are allotted primarily on the quality of the science produced, the quality of the presentation is of secondary importance.

Coursework

Coursework must be completed and assessed prior to submission of your thesis at the end of the year. Chosen courses must represent 100 hours of work. Courses can be selected from third year units of study (or part thereof) that you did not complete in your undergraduate degree, or alternatively, from courses offered at other institutions. The latter are listed on the SUCOGG website at http://www.sucogg.org/. It is extremely important that you make a decision on your choice of coursework during the first two weeks of the semester and contact the relevant coordinators immediately to register your interest. Course timetables often change or are cancelled if there is insufficient interest.

Failure to complete 100 hours of coursework will result in a mark of zero for the uncompleted portion of your coursework. It is possible to substitute SUCOGG Honours coursework with other courses or by a Special Project. In this case you will need to seek approval from the Honours coordinator. It is NOT possible to substitute coursework with other types of projects.

Special Project rules

The option of Special Projects exists to accommodate unforeseen circumstances for particular Honours students, preventing them to find a suitable set of SUCOGG units to take. These circumstances may include field work commitments during particular SUCOGG courses or an Honours project starting in semester 2. The Special Project cannot be directly related to the Honours topic. A marking scheme against clear project outcomes and the number of hours attributed to a Special Project must be approved by the Honours coordinator, or the Head of School (or delegate) in cases where the student involved is supervised by the Honours coordinator. The Project cannot be marked by the Supervisor. Marking by non-staff members (e.g., CSIRO) may be allowed but must be re-evaluated by a staff member other than the Supervisor before results are provided to the student. Staff members should attempt to accommodate requests from students and their Supervisors for suitable projects and/or assessments.
Assessment

The marking scheme used for presentations and theses are available online. Check the School of Geosciences website and follow the links to the honours program.

Your final grade for honours is based on:

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<th>Written thesis</th>
<th>75%</th>
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<tr>
<td>Public presentation of thesis</td>
<td>5%</td>
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<tr>
<td>Roughly 100 hours of course work</td>
<td>20%</td>
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Honours Grades

The following guidelines are based largely upon the Faculty of Science requirements.

95-100
Outstanding First Class quality of clear Medal standard, demonstrating independent thought throughout, a flair for the subject, comprehensive knowledge of the subject area and a level of achievement similar to that expected by first rate academic journals. This mark reflects an exceptional achievement with a high degree of initiative and self-reliance, considerable student input into the direction of the study, and critical evaluation of the established work in the area. Qualities of an outstanding thesis may include;
1. A well chosen issue for investigation with the aims and conclusions being clearly stated within the context of a well-developed and relevant body of literature.
2. Research design and investigation procedures that are appropriate to the problem selected.
3. Some evidence of originality in experimental design.
4. A clear, grammatically correct, concise and coherent and thesis that is logical in its structure and has tables, maps, graphs, etc. that are well presented, referenced and accurate. References are correctly cited and, where necessary, detailed data and statistical sources are included in appendices.
5. A high level of understanding of the subject area, including the significance of the work and the limitations of the work.
6. An ability to work with an adviser, but not to rely upon the adviser to generate ideas. In other words, a high level of initiative should be shown.
7. A thesis that is publishable in some form (after abbreviation and minor modifications) in a scientific journal.

90-94
Very high standard of work similar to above but overall performance is borderline for award of a Medal. Lower level of performance in certain categories or areas of study above.

80-89
Clear First Class quality, showing a broad and deep command of the field, with the presentation of some novel insights. Student will have shown a solid foundation of conceptual thought and a breadth of factual knowledge of the discipline, clear familiarity with and ability to use central
methodology and experimental practices of the discipline, and clear evidence of some independence of thought in the subject area. Some student input into the direction of the study or development of techniques, and critical discussion of the outcomes.

75-79
Second class honours, first division - student will have shown a command of the theory and practice of the discipline. They will have demonstrated their ability to conduct work at an independent level and complete tasks in a timely manner, and have an adequate understanding of the background factual basis of the subject. Student shows some initiative but is more reliant on other people for ideas and techniques and the project is dependent on supervisor’s suggestions. Student is dedicated to work and capable of undertaking a higher degree.

70-74
Second class honours, second division - student is proficient in the theory and practice of their discipline but has not developed complete independence of thought, practical mastery or clarity of presentation. Student shows adequate but limited understanding of the topic and has largely followed the direction of the supervisor.

65-69
Third class honours - performance indicates that the student has successfully completed the work, but at a standard barely meeting honours criteria. The student’s understanding of the topic is extremely limited and they have shown little or no independence of thought or performance.

0-64
The student's performance in fourth year is not such as to justify the award of honours.

Your final Honours grade is based upon work completed during your Honours year, and in the case of University Medals and H1, your WAM.

**Timetable for 2008**

March 24-20  Submission of research proposal and presentation  
April 25-24  Submission of literature review  
September 19  First full draft of thesis submitted to supervisor  
October 31  Submission of thesis  
November 3  Final presentation of thesis results

**Penalty for Lateness**

A penalty of 5% per day will be deducted for late thesis submission. No extensions are granted unless a Special Consideration form is submitted and approval granted.