

**School of Engineering**  
**Trinity College Dublin**



**Research Student Handbook**  
**2011-12**

## Introduction

This handbook describes regulations that apply to postgraduate research students in the School of Engineering during the academic year 2011/2012. Its aim is to provide guidance for students studying for MAI, MSc or PhD research degrees in Engineering. The information provided complements the College regulations and describes how these regulations are implemented in the School of Engineering.

## College Regulations

Regulations for Higher Degrees by Research are contained in the College Calendar Part II, Sections 1 and 2. The College Calendar is available online (<http://www.tcd.ie/local/>). Students should refer to the College Calendar for general regulations governing higher degrees by research only:

- Admission requirements
- Probation
- Subject of research
- Role of Director of Teaching and Learning (Postgraduate)
- Progress and continuing registration
- Role of Supervisors
- Attendance
- Part-time registration
- Extensions and off-books
- Transfer to the Ph.D. register
- Procedure for examination of a candidate
- Complaints concerning supervision
- Appeal against the decision of examiners
- Plagiarism

## Admission

Applications for admission as a Research Student are made through the Postgraduate Applications Centre (PAC: [www.pac.ie](http://www.pac.ie)). All applications must identify a proposed supervisor and provide a short research project proposal. Successful applications must be accepted by the proposed supervisor, Head of Discipline, Director of Teaching and Learning (Postgraduate) and the Dean of Graduate Studies.

Within approximately six weeks of their first registration as a research student, each student should prepare an initial research plan jointly with their Supervisor. This plan should normally be based on the research proposal submitted upon application and set out the project objectives, research methods and facilities to be used, and the main tasks to be completed. It should be approximately two pages in length and copies should be retained by both student and supervisor.

As per the College regulations, entry to the research register is normally onto the PhD register on a probationary basis and students are required to undergo a formal review process within the first 18 months in order to continue on the PhD register (extended to 30 months for part-time students). Students who enter on the MSc register but who wish to transfer to the PhD register go through a similar transfer process. Further details are provided in the Confirmation/Transfer section below.

## Supervision

A student's Supervisor shall provide advice and assistance that shall include, in particular, the College regulations and matters relating to academic progression and examination. The Supervisor shall provide advice and guidance on sources of funding and introduce the student to others in their Department and research group.

The Supervisor shall also give the students all possible assistance regarding access to the material, equipment and other resources essential to their research and in developing a feasible research plan that will lead to a thesis of acceptable standard. Best Practice *Guidelines* on Research Supervision for Academic Staff and Students are available at:

[www.tcd.ie/Graduate\\_Studies/currentstudents/supervision/index.php](http://www.tcd.ie/Graduate_Studies/currentstudents/supervision/index.php).

Joint supervision is permitted if approval is obtained from the Dean of Graduate Studies. Where appropriate, an external co-supervisor from outside College can be appointed. In all cases of joint supervision one Supervisor shall be the Principal Supervisor and they should be a member of the academic staff in the School of Engineering. A co-supervisor request form is available at:

[www.tcd.ie/Graduate\\_Studies/staff/supervision/cosupervisorchanging/index.php](http://www.tcd.ie/Graduate_Studies/staff/supervision/cosupervisorchanging/index.php)

Complaints about the adequacy of supervision should normally be made first to the Director of Teaching and Learning (Postgraduate). In line with College regulations, complaints about the adequacy of supervision will not be entertained once a thesis has been presented for examination.

It is a research student's responsibility to keep their supervisor fully informed about the progress of their research, including any difficulties or delays they experience. The communication of information about ongoing research in this manner is an important element of an engineering research student's education and training. Research students must inform their Supervisor as soon as is practicable if they are incapacitated by illness or other grave cause and unable to undertake their agreed research programme.

## Modules

Research students in the School of Engineering are required to undertake taught modules to support their research and postgraduate education. Modules worth a minimum of 15 ECTS or equivalent must be completed by each student. Research Students following the GREP ENG (structured graduate research education programme) must take 30 ECTS including modules from the innovation academy.

Part-time MAI students are exempt from this requirement, but should consult with their supervisors on how the completion of modules could support their particular research project.

The modules to be completed should be selected by each student in consultation with their supervisor, taking into account their individual circumstances and requirements in light of their prior qualifications and their research project. The modules selected may enhance the candidate's breadth and depth in their area, strengthen their research and research-related skills, or provide other expertise that may enhance their potential career opportunities. These modules may be

- Discipline specific, i.e. related to the student's field of research
- Generic engineering, i.e. supporting a wide range of engineering research
- Broad curriculum, i.e. intended to expand a student's learning experience

The modules can be completed in any appropriate setting, including the School of Engineering, elsewhere in College, or at another University or Institute in Ireland (e.g. a DRHEA or SPP partner) or elsewhere. Wherever possible PhD students should endeavour to complete PhD level (Level 10) modules, but it is recognized that these are not available in all subject areas.

Credit of up to 5 ECTS can be assigned to formally assessed periods of research training at specialist research facilities.

Students are advised to complete their modules within 12 months of admission to College as a postgraduate research student. MSc research students must complete their modules prior to submission of their thesis. MSc students wishing transfer to the PhD register must have completed 15 ECTS of modules. PhD students should normally complete their modules prior to confirmation on the PhD register (see below). Exceptionally for scheduling or other reasons, PhD students may complete some of their modules following the confirmation stage, but in this case the modules and a date for their completion must be set-out in the student's confirmation report.

Students participating in structured PhD programmes (SPPs) may need to complete additional requirements, set out in each case by the by Director of the SPP. These requirements must be additional to and compatible with the general College regulations and Engineering School requirements set out in this handbook.

### **Module Information:**

Dublin Region Higher Education Alliance: [http://www.drhea.ie/grad\\_educ.php](http://www.drhea.ie/grad_educ.php)

TCD Innovation Academy: [www.innovationalliance.ie/academy/index.html](http://www.innovationalliance.ie/academy/index.html)

MSc Bioengineering:

[www.tcd.ie/bioengineering/education-outreach/postgraduate/prospective.php](http://www.tcd.ie/bioengineering/education-outreach/postgraduate/prospective.php)

MSc Civil Engineering: [www.tcd.ie/civileng/postgraduate/msc/](http://www.tcd.ie/civileng/postgraduate/msc/)

MPhil Music and Media Technology: [www.mee.tcd.ie/mmt/index.php](http://www.mee.tcd.ie/mmt/index.php)

Statistics for Research Students: [www.tcd.ie/Statistics/genericskills/index.shtml](http://www.tcd.ie/Statistics/genericskills/index.shtml)

Postgraduate Diploma in Statistics: [www.scss.tcd.ie/postgraduate/dipstats/](http://www.scss.tcd.ie/postgraduate/dipstats/)

GREP ENG: [www.tcd.ie/grepeng](http://www.tcd.ie/grepeng):

### **Progression**

Annual progress report forms should be completed by students and their Supervisors for retention on the student file within the School and review by the Director of Teaching and Learning (Postgraduate). Students and their supervisors should pay particular attention to the completion of their progress report at the end of the first year of research. The appropriate form may be downloaded from the local page of the Graduate Studies Web site:

[http://www.tcd.ie/Graduate\\_Studies/currentstudents/admin/progressreports/index.php](http://www.tcd.ie/Graduate_Studies/currentstudents/admin/progressreports/index.php).

Supervisors will be reminded of confirmation reports pending for their students and should reply by email on behalf of the student to the course administrator [cspillan@tcd.ie](mailto:cspillan@tcd.ie) / [grepeng@tcd.ie](mailto:grepeng@tcd.ie) with the progress report attached.

### **Confirmation/Transfer**

A stringent process of academic assessment for all PhD students to confirm their continuation on the Ph.D. register shall normally be arranged within the first eighteen months of registration (extended by a further year for part-time PhD students). This assessment represents an important part of a student's postgraduate education. It provides a formal opportunity for a review of the research project by an independent expert whose external considered view is normally of much value in planning the remainder of the project.

The PhD confirmation process requires the student to prepare a Ph.D. *confirmation report*; this report should provide sufficient information on the context, objectives, progress and planning of the project to allow an assessment to be made of whether the student should continue to work towards the completion of a PhD thesis. The student's supervisor will provide guidance to the student on the contents and preparation of the report, and advise the student of the standard required. Guidelines for the contents of the report are provided below, but as each PhD thesis represents a unique original research work, no single form of report is universally applicable.

The student shall be invited to attend a Ph.D. *confirmation interview* to discuss their confirmation report and plans for completion. The Ph.D. *confirmation panel* for each student will comprise two members of the academic staff, normally identified by the student's supervisor and approved by the Director of Teaching and Learning (Postgraduate). The Supervisor shall not be a member of the Ph.D. confirmation panel, but should be present at the interview to ensure that they are aware of the panel's critique of the student's work. Feedback shall be given to the student as soon as possible after the interview. The panel shall recommend one of the following: (a) continuation on the Ph.D. register, (b) continuation on the Ph.D. register after some minor changes have been made to the Ph.D. confirmation report, (c) continuation on the Ph.D. register subject to the completion of identified modules within a specified time period, (d) continuation on the Ph.D. not recommended at this time: a new report to be written and confirmation interview to be held again as soon as possible thereafter, (e) a recommendation to change to the general Masters register to submit a Masters thesis, or (f) not to continue as a postgraduate research student. A student may appeal the result of a Ph.D. confirmation interview.

A transfer process shall be completed to decide on the eligibility of students on the MSc register who wish to be transferred to the PhD register. This process is similar to the PhD confirmation process outlined above and shall normally be completed within the first eighteen months of registration.

**Confirmation Report Guidelines:** To allow the interview panel to form an informed view on the research student and their project, a confirmation (or transfer) report should include the following items:

- A description of the background to the project, including a summary of previous research on the topic, leading to a clear definition of project aims and objectives.
- A clear demonstration that the student has good awareness of the fundamentals/theory underpinning the topic being addressed and the methods available to address it.
- A description of the research methods (e.g. experimental, computational) employed in the project.

- A summary of the research completed to date, with findings (if any).
- A summary of the tasks to be completed up to project end, with expected results and a timetable for completion.
- A list of papers, reports, presentations completed to date and planned.
- A list of non-thesis learning activities completed and planned (modules, teaching/demonstrating, seminars/conferences, paper reviews, etc.)
- References/bibliography.

### Thesis Submission

The maximum periods before submission of a thesis by research students on the full-time MSc and PhD registers are two and four years respectively. An extension of the period within which the thesis can be presented may be obtained by application to the Dean of Graduate Studies by the student's Supervisor and must have a strong recommendation from the Director of Teaching and Learning (Postgraduate).

The submission of a thesis is at the discretion of the candidate. A candidate is advised, but not required, to seek the agreement of his/her Supervisor prior to submission. The essential requirements of Masters and PhD theses are set out in the Calendar.

### Examination

Following thesis submission, the Director of Teaching and Learning (Postgraduate) in consultation with the Supervisor will nominate an external examiner and an internal examiner to independently examine the thesis. A *viva voce* examination is a requirement of the examination of a PhD candidate. For a Masters examination a *viva voce* will be arranged at the request of either examiner or the Director of Teaching and Learning (Postgraduate). The internal examiner has overall responsibility for organising the *viva voce* examination, supported by the student's supervisor and the School administration. The *viva voce* will be chaired by a senior academic nominated by the Director of Teaching and Learning (Postgraduate). The Supervisor may be present at the *viva voce* examination purely as an observer unless the student wishes otherwise.

In the case of a Masters degree the examiners may propose that

- (i) the degree be awarded for the thesis as it stands;
- (ii) the degree be awarded for the thesis subject to minor corrections;

- (iii) the thesis be referred for major revision and subsequent re-examination;  
or
- (iv) the thesis be failed.

When examiners propose either failure or referral of an MSc thesis for revision, they must hold a *viva voce* examination.

In the case of a Ph.D. thesis the examiners may propose that

- (i) the degree be awarded for the thesis as it stands;
- (ii) the degree be awarded for the thesis subject to minor corrections;
- (iii) the thesis be referred for major revision and subsequent re-examination, for which six months are normally allowed from the time of notification,
- (iv) a lower degree be awarded, if necessary following minor corrections to the thesis, or
- (v) the thesis be failed.

For MSc and PhD theses, minor corrections should be completed within two months of the candidate being informed of corrections required. The internal examiner will confirm that corrections have been carried out satisfactorily and inform the Graduate Studies Office. Major revision of the thesis should be completed within six months of notification. A re-examination of the revised thesis is required, but a second *viva voce* examination will not be held. A student may appeal the decision of the examiners.

## School of Engineering Contacts

Head of School: Professor Margaret O'Mahony; [mmmahony@tcd.ie](mailto:mmmahony@tcd.ie)

Director of Postgraduate Teaching and Learning: Professor Henry Rice; [hrice@tcd.ie](mailto:hrice@tcd.ie)

School Administrator: Ms Linda McHugh; [lmchugh@tcd.ie](mailto:lmchugh@tcd.ie)

Administrative Officer-Postgraduate: Mr Conor Spillane; [cspillan@tcd.ie](mailto:cspillan@tcd.ie)

Executive Officer: Ms Katherine Walsh; [walshk7@tcd.ie](mailto:walshk7@tcd.ie)

Director MAI Research (Recurrent Education): Dr Brendan O'Kelly; [bokelly@tcd.ie](mailto:bokelly@tcd.ie)

Administrator GREP ENG: Ms Melanie Apied; [grepeng@tcd.ie](mailto:grepeng@tcd.ie)

<http://www.tcd.ie/Engineering/contact/>

## Engineering Departmental Contacts

Civil, Structural and Environmental Engineering:

Head of Department: Dr Laurence Gill; [gilll@tcd.ie](mailto:gilll@tcd.ie)

Senior Executive Officer: Ms Patricia Tutty; [tuttyp@tcd.ie](mailto:tuttyp@tcd.ie)

Mechanical and Manufacturing Engineering:

Head of Department: Professor David Taylor; [dtaylor@tcd.ie](mailto:dtaylor@tcd.ie)

Executive Officer: Ms Judith Lee; [julee@tcd.ie](mailto:julee@tcd.ie)

Electronic and Electrical Engineering:

Head of Department: Dr Martin Burke; [matin.burke@tcd.ie](mailto:matin.burke@tcd.ie)

Executive Officer: Ms Teresa Lawlor; [tmlawlor@tcd.ie](mailto:tmlawlor@tcd.ie)

## General College Contacts

Postgraduate Advisory Service:

[pgsupp@tcd.ie](mailto:pgsupp@tcd.ie)

[http://www.tcd.ie/Senior\\_Tutor/postgraduate/](http://www.tcd.ie/Senior_Tutor/postgraduate/)

Junior Dean and Registrar of Chambers:

[Junior.Dean@tcd.ie](mailto:Junior.Dean@tcd.ie)

[http://www.tcd.ie/Junior\\_Dean/Registrar/](http://www.tcd.ie/Junior_Dean/Registrar/)

General information on fees and registration:

[www.tcd.ie/Graduate\\_Studies/currentstudents/admin/feesandreg/index.php](http://www.tcd.ie/Graduate_Studies/currentstudents/admin/feesandreg/index.php)

GSO information booklet for international students (also useful for many Irish students!):

[www.tcd.ie/Graduate\\_Studies/index.php#international](http://www.tcd.ie/Graduate_Studies/index.php#international)

## Key Contacts for Postgraduate Students:

### Graduate Studies Office

Leslie McCartney	Research courses	2896
Bernadette Curtis	Taught courses	2182
Sinead O'Carroll	Thesis submission	1561

See also [http://www.tcd.ie/Graduate\\_Studies/](http://www.tcd.ie/Graduate_Studies/)

### Fees Office

Jackie Byrne	Student fees	1852
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See also [http://www.tcd.ie/Treasurers\\_Office/fees/](http://www.tcd.ie/Treasurers_Office/fees/)

### Staff Office

Rachel Byrne	Payment of research Awards	2493
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See also [http://www.tcd.ie/Staff\\_Office/index.php](http://www.tcd.ie/Staff_Office/index.php)

### Student Records Office

Eilis Dunne	Registration	3078
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See also [http://www.tcd.ie/Senior\\_Lecturer/sro/](http://www.tcd.ie/Senior_Lecturer/sro/)

### Student Counselling

[http://www.tcd.ie/Student\\_Counselling/student-learning/postgraduates.php](http://www.tcd.ie/Student_Counselling/student-learning/postgraduates.php)

## Guidelines for Examiners of Candidates for the PhD – September 2011

An external examiner and an internal examiner (two external examiners in the case of candidates who are members of staff of the University) are nominated to the Dean of Graduate Studies by the School's Director of Teaching and Learning (Postgraduate) in consultation with the Supervisor. Each examiner must independently submit a signed report and completed decision form to the Dean of Graduate Studies after the viva voce examination. Examiners' names are formally presented to the University Council in consolidated form once a year.

### 1. Expected Standards of the Thesis Submitted for Examination

In judging the merit of a thesis submitted in candidature for the degree of Ph.D., the examiners should expect the standard and scope of work that a capable and diligent student should present after a period of three to four years of full-time study or its part-time equivalent.

In making their recommendations, examiners should note the **standard criteria** for a doctoral thesis in this University: it must show evidence of rigour and discrimination, appreciation of the relationship of the subject to a wider field of knowledge/scholarship, and make an appreciable, original contribution to knowledge; it should show originality in the methods used and/or conclusions drawn, and must be clear, concise, well written and orderly and must be a candidate's own work.

The submission of a thesis is at the discretion of the candidate. A candidate is advised, but not required, to seek the agreement of his/her supervisor prior to submission. Postgraduate students whose thesis is under examination are considered as registered students of the university for the duration of the examination.

### 2. Viva Voce Examination

A viva voce examination is a normal requirement in the examination of a Ph.D. thesis. The internal examiner will make arrangements in conjunction with the School admin staff for date and time for the *viva voce*. The external examiner should contact the internal examiner directly, not the Graduate Studies Office, concerning these arrangements.

The conduct of the examination is the responsibility of the examiners, in consultation with the Director of Teaching and Learning (Postgraduate). The Director of Teaching and Learning (Postgraduate) or nominee may chair the viva voce. Application must

be made to the Dean of Graduate Studies in advance of the viva voce if it is proposed to run the viva voce on any other basis than that of a live face-to-face examination with all participants in the same venue: such applications will only be favourably considered in the most exceptional circumstances. The supervisor, or under exceptional circumstances and with the prior agreement of the Dean of Graduate Studies, other cognate person, may attend the viva voce examination with the agreement of the examiners. If the supervisor attends the viva voce it is as an observer only; the supervisor may not partake in the examination, though the examiners may invite the supervisor's contribution on points of clarification.

Normally, the viva voce examination is held in Dublin, with the travel and accommodation expenses of the external examiner covered by College (economy class air fare for overseas travel). Exceptionally, the Director of Teaching and Learning (Postgraduate), in consultation with examiners and the candidate, and with the prior approval of the Dean of Graduate Studies, may arrange for the examination to be held outside Dublin, in which case the internal examiner's travel expenses (but not the candidate's expenses) will be covered by College.

When there is disagreement between examiners as to whether a thesis should be passed as it stands or passed with minor corrections, the Dean of Graduate Studies will adjudicate. Where there is disagreement between examiners as to whether a thesis should be referred for major revision, awarded a lower degree or failed, the Dean of Graduate Studies attempts to get agreement between examiners on the course to be adopted. If agreement is not achieved, the Dean of Graduate Studies may adjudicate or propose that new examiners be appointed. This change of examination arrangements must be duly notified to and approved by the University Council. If new examiners are appointed, all reports are sent to the Dean of Graduate Studies.

The candidate must complete the corrections required by examiners and submit two hardbound copies in the final corrected form to the Graduate Studies Office before the candidate's name is submitted to the University Council. A memorandum is required from the internal examiner certifying that corrections have been carried out satisfactorily. Minor corrections should be completed within two months of the candidate receiving an official results letter from the Graduate Studies Office informing them that corrections are required. If the examiners refer the thesis for major revision, this means that re-examination is required (though a second viva voce is not permitted) and the candidate must pay a revision fee (see the University Calendar, Part 2, Section 8). Under exceptional circumstances, and with the prior permission of the Dean of Graduate Studies, revised theses' may be submitted up to an absolute maximum of two years after the original date of submission. Such late submissions will be subject to a further revision fee. A thesis can only be referred for such major revision once – and a thesis can therefore only be examined twice in total before a final decision on it is reached.

### 3. Examiner's Formal report to University Council

Examiners are asked to complete the examination process, including viva voce, **within two months** of receiving the thesis or as soon as practically possible thereafter. Internal and external examiners must report separately. Each must return their copy of the decision form (enclosed) appropriately completed and signed, along with their independent, signed, report directly to the Dean of Graduate Studies for submission to the University Council. The decision forms and typescript reports must be independent to allow for examiners to take different positions if they wish. This does not preclude discussion between examiners whose names will be made known to each other in their respective letters of appointment.

There is no set format for an examiner's report. However, it should confine itself to justification for the decision reached, reported in the context of the *standard criteria* on the previous page. An external examiner's report on an examination for a doctoral thesis should not normally exceed three pages.

The typescript report must contain a clear recommendation in the phraseology below, as to whether:

- 1) the degree should be awarded for the thesis as it stands
- 2) the degree should be awarded, subject to minor corrections being made to the thesis

Candidates are allowed two months from the time of notification from the Graduate Studies Office to complete the corrections. The typescript report must make clear to the candidate the corrections which their thesis requires. This might be accomplished in the form of an annotated copy of the thesis, or a list of corrections or both. The internal examiner must confirm to the Dean of Graduate Studies that the required corrections have been carried out satisfactorily.

- 3) the thesis should be referred back for revision

The candidate is required to re-register and pay a revision fee and to submit the revised thesis for re-examination by both examiners **within six months**. The typescript report must make clear to the candidate the areas in which their thesis is deficient and the corrections which are required. In part, this might be accomplished in the form of an annotated copy of the thesis, or a list of corrections or both. However, an additional, extensive critique of the deficiencies of the thesis is also required. The Calendar provides that revised theses may be submitted up to an absolute maximum of two years from the original date of submission in exceptional circumstances and with the prior permission of the Dean of Graduate Studies. No viva voce examination will be held during re-examination of the thesis. This option (3) is not available if the thesis has already been referred back for revision.

4) a lower degree (M.Sc., M.Litt.) should be awarded

A lower degree should be awarded if necessary following minor corrections to the thesis. The typescript report must make clear to the candidate the areas in which their thesis is deficient and why these deficiencies are not addressable by revision or re-submission.

5) the thesis should be failed (*i.e.* rejected)

The typescript report must make clear to the candidate the areas in which their thesis is deficient and why, in the examiner's view, the thesis is irredeemably flawed.

#### **4. Freedom of Information Acts**

The texts of the external and internal examiners' reports are initially available only to the Dean of Graduate Studies, the University Council, the Director of Teaching and Learning (Postgraduate) and the Supervisor. However, candidates are entitled to see the reports relating to their examination on written request. Such requests should be addressed to the Director of Teaching and Learning (Postgraduate) who would bring their request to the Dean of Graduate Studies.

Under the terms of the Irish Freedom of Information Acts 1997 and 2003, the University of Dublin, Trinity College, in common with other Irish universities, is a prescribed 'public body' subject to the Acts. These FoI Acts provide a right of access to records held by public bodies. External examiners should note that anything written or recorded in any form by them in the course of and for the purposes of the performance of their functions as an external examiner may be the subject of a request under the Freedom of Information Acts. The right of access includes the right to one's own personal records, and the examination records of students come under the definition of a student's personal records. These records would include examiners' reports and any examination scripts and assessments that have been marked (and annotated) by the examiners. In general, the College must give a copy of these records to the student concerned if he or she makes a request for them under the Freedom of Information Acts. Additionally, students have the right to be given, on request, a written statement of the reasons for a decision of the College that affected them as individuals. Such decisions would include examination/assessment issues.

Further information regarding the Acts and their application to Trinity College is available at <http://www.tcd.ie/foi/>

## Trinity College Dublin Postgraduate Research Studentships (Code 1252)

### General

A number of postgraduate studentships are made annually to highly qualified candidates to enable them to undertake postgraduate studies in the University of Dublin, Trinity College. Application regulations changed in 2009 with the result that these studentships are now open to new entrants to the full-time Ph.D. register **as well** as continuing students in a given academic year.

The value of the studentship in 2010/2011 is €8,000 as a contribution towards maintenance, plus waiver of the annual fee. The maintenance is payable monthly via the Staff Office payroll over twelve months. Applications are assessed competitively and nominations are made at a Faculty level. As the number of studentships is limited, applicants are strongly advised to apply for all other awards and grants open to them. Candidates are expected to apply for the renewal of any Local Authority Scholarship they may have held as undergraduates. Research Scholarships awarded by the Ministry for Education for Northern Ireland are tenable in the University of Dublin, Trinity College.

Individual Schools, particularly in the Engineering, Mathematics and Science and Health Sciences Faculties may have specific funds at their disposal and candidates, when applying, should enquire as to the availability of such funds.

### Eligibility

Normally postgraduate studentships will be made only to applicants who are placed in the first class or the first division of the second class at a moderatorship or final examination or who obtained equivalent status at a final degree examination in a professional subject. However, graduates who are reading for the Ph.D. degree may be eligible if they have already received a Masters degree (excluding the degree of Master in Arts) from the University, irrespective of the class of primary degree received.

Postgraduate studentships cannot continue beyond the fourth year on the Ph.D. register.

### Conditions

The Trinity College Dublin postgraduate research studentships are open to graduate students undertaking research in any branch of learning subject to availability of resources and supervision in the chosen area. They are offered subject to the following conditions:

1. the holders must engage in full-time research and must register for a Ph.D. degree in the University of Dublin;
2. holders are required to engage in relevant academic and professional activities as determined by the supervisor. Within such activities, teaching-related activities such as demonstrating are limited to a maximum of six hours per week and are governed by guidelines provided by the Graduate Studies Committee.
3. income received by applicants from other sources (such as private tuition, research funding), can be to the **maximum annual income level of €18,000** excluding fees but including the studentship maintenance. The receipt of any additional funding must be notified immediately to the Graduate Studies Office and the Staff Office payroll.

### **Applications**

**Continuing students** who wish to apply for this postgraduate Award should contact their School directly. Nominations are considered at various times of the year depending on the School. New applicants are advised to submit their applications as early as possible.

### **Assessment Criteria**

Valid applications will be reviewed by the School of Engineering's Director of Teaching and Learning (Postgraduate) in consultation with another nominee approved by the School Executive Committee. The principle criteria will include:

1. Performance at undergraduate level;
2. Evidence of research output at time of application particularly publication activity and interaction with outside bodies;
3. Logistical issues such as supervisor loading, access to other funding sources, international aspects.

Offers will then be made on the basis of a ranked list.