

Academic Guidelines for Students

Engineering, Science, Technology, Entrepreneurship Excellence
Master's Program (ESTEEM)



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1. About the Engineering, Science and Technology Entrepreneurship Excellence Masters (ESTEEM) Program

The ESTEEM Program is a new paradigm for educating science and engineering students to develop new product and process concepts from basic science, engineering, and high technology knowledge. This unique curriculum focuses on translating science and engineering knowledge into products with great societal value through entrepreneurship and the development of business acumen.

Our primary goal is to prepare students in this program for a lifelong engagement with innovation. The uniqueness of the program is its commitment to new product and business development flowing from science and engineering knowledge and discoveries. Our academic objectives focus on the integration of learning and creating, the extension of knowledge to solutions, the expression of personal values, talents, and purpose through innovation, teamwork, and the startup of enterprises which provide opportunities for others.

Innovation in the areas of technology and management in science and engineering has been the dominant source of productivity gains and new enterprises in the United States economy over the last fifty years, accounting for as much as fifty percent of U.S. economic growth. In our increasingly complex, technologically oriented economy, professionals who are deeply grounded in science and technology and have the expertise to manage human, financial, and technological capital are sorely needed.

Vision Statement

The University of Notre Dame's ESTEEM Program is a new paradigm for educating science and engineering students to develop new product and process concepts from basic science, engineering, and high technology knowledge. The heart of the program is dynamic, small group interaction among faculty, students, and technology leaders. This unique curriculum focuses on translating science and engineering knowledge into products with great societal value through entrepreneurship and the development of business acumen. We will build upon Notre Dame's greatest assets: an overarching desire to be a force for good in the world; a strong ethical and moral environment; a tradition of science, engineering, and business working collaboratively in a liberal arts environment; and the collective intellectual capital of extraordinary students, faculty, and external constituencies.

Mission Statement

The ESTEEM Program's mission is to provide, within the framework of a premier Catholic research university, a singular learning experience in which science and engineering knowledge and discovery are transformed into societal and economic value. Our primary goal is to prepare students in this program for a lifelong engagement with innovation that is wholly congruent with our distinctive Catholic character, fostering a culture of excellence, inclusion, collaboration, respect for diverse ideas, and care for the common good. The uniqueness of the program is its commitment to new product and business development flowing from science and engineering knowledge and discoveries. Our academic objectives focus on the integration of learning and creating, the extension of knowledge to solutions, the expression of personal values, talents, and purpose through innovation, teamwork, and the startup of enterprises which provide opportunities for others. ESTEEM builds on the rich tradition of Notre Dame in liberal arts, sciences, and professions, and is consistent with the forces that drive innovative organizations and contemporary education -- sweeping technological change and globalization. The curricular experience will actively engage students and faculty with thought leaders and innovators to create synergy and cultivate practical lifelong skills.

2. Curricular Requirements

Although each student will focus on a particular area of technology, all ESTEEM students are required to take a series of core courses that have been designed specifically for the program.

Thirty (30) semester credit hours of course work are required for the ESTEEM Master's Degree. This includes the completion of the Thesis project.

Business Management & Entrepreneurial Courses

Students must complete a total of six courses for a total of 7.5 credit hours as part of the Business Management portion of ESTEEM. These courses focus on learning technology business fundamentals. Coursework includes finance, technical marketing, accounting, finance, organizations and leadership, strategy and ethics classes.

Business Law (ESTM-60105). Intellectual Property law (Including patents, copyrights, trademarks, and trade secrets) and the basics of corporate law are the main topics of this course. Issues related to inventions stemming from early embryonic ideas, including university research and breakthrough technologies, are emphasized.

Technical Marketing (ESTM-60102). This course covers the application of modern marketing techniques in design, development, and commercialization of embryonic and high-risk technologies. Models, theories, and frameworks are employed to identify and analyze markets. The interaction with the customer in the context of the innovation cycle, culminating with issues associated with the evolution of the concept through new product development and commercialization stages — from invention to venture for start-up companies and from invention through product development in larger companies, will be stressed.

Accounting and Finance (ESTM-60107 & ESTM-60101). These courses cover accounting fundamentals and financial analysis tools. Practical issues will be addressed, including balance sheets, income statements, cash flow, and present value calculations, with a focus on finance for high-technology and entrepreneurial firms.

Organizations (ESTM-60104). Organizations, leadership, and human capital, focusing on the attributes of effective leadership and management are studied. This includes tactical, operational, and strategic leadership as it relates to research in the university enterprise, high-technology start-up companies, and Fortune 500 companies.

Strategy (ESTM-60103). Emphasizing action-reaction models in the marketplace and society, this course reviews strategic decisions and tactical action analysis in order to implement technological change (including radical technological change).

Ethics (ESTM-60106). Implementing technologies that produce radical change inevitably introduces ethical dilemmas for scientists and engineers. Topics covered in this course include the ethical engineer/scientist and organization, entrepreneurs, and research and development and start-up organizations; the interface between ethics and environmental, health, and safety issues for scientists and engineers; and ethical dilemmas in large and small organizations.

Operations Management Courses

Students must complete a total of six courses for 4.5 credit hours as part of the Operations Management portion of ESTEEM. These courses focus on technology and operations management. Coursework includes advanced financial topics, statistical methods, R&D management, planning, which includes quality and project management practices, operations research and supply chain management.

Advanced Financial Topics (ESTM-60202). This course utilizes sophisticated mathematical models and algorithms to evaluate and interpret operations and the financial positions and the valuation of science- and engineering-based enterprises for use in the business sector.

Statistical Methods (ESTM-60201). Providing an overview of statistics (including probability, random variables, probability distributions, expectation, discrete and continuous probability distributions, sampling distributions, and confidence intervals) with a more comprehensive treatment of hypothesis testing, linear regression and correlation, and selected topics from nonparametric statistics, this course focuses on problems faced by large research and development organizations as well as small, high-technology companies.

Research and Development Management (ESTM-60205). Throughout this course students will review concepts involved in the strategic and new venture development planning in a modern high-technology company and intensive research components. They will study issues involved in management of research and development as well as the functional characteristics of breakthrough technologies, small venture expansion via technological innovation, product development in large corporations, and dynamics of management structure to accommodate advances in science and technology.

Planning (ESTM-60206). Discussions in the course will stress quality planning, forecasting, and project management as an accelerated look at a systems approach to planning, scheduling, and controlling science-based and engineering-based projects, research and development costs, and trade-off analysis in the context of increased productivity and competitiveness.

Operations Research Models (ESTM-60203). This course emphasizes operation research as a key to improving performance in research and development organizations and start-up companies while minimizing risk. Topics to be covered include operations research models in terms of deterministic modeling (linear programming, Simplex Method, sensitivity analysis, and problem framing) and probabilistic modeling (Markov chains, queuing theory, inventory theory, forecasting, and decision analysis).

Supply Chain Management (ESTM-60204). Supply chain management is the combination of art and science that helps to deliver a product or service to customers. This course will stress the basic components of supply chain management, both their qualitative and quantitative features, in the context of organizations.

Science & Engineering Courses

ESTEEM students must select two science and/or engineering courses, which complement their thesis topic, further refining their technical skills in a specific area. Two courses (6 credits) are required for graduation from the program.

Entrepreneurial Capstone Project

In addition to their coursework, ESTEEM students are required to complete a capstone project in which they work with the faculty mentor who has seeded the concept for the project. This project is 12 credits.

3. Entrepreneurial Capstone Thesis Project

All ESTEEM students are required to complete a capstone project in which they work with the faculty mentor who has seeded the concept for the project. Each student must thoroughly evaluate the technology and develop the seed concept into a complete business plan. 12 credits are awarded upon completion of the project.

Working closely with a faculty mentor, students may pursue options in a wide variety of fields. Typical projects that have been available include but are not limited to:

Health

- Virus like particles
- Tissue vaccines
- The role of lipids in biological membranes
- Water-soluble cytotoxic cancer treatment

Social Programs

- Genetics and genomics to fight dengue fever

Energy

- Harnessing wasted energy
- Nanotechnology-based solar cells
- Solar Harvestors

Environment

- Portable diagnostics for invasive species detection
- Remote sensor for water pollutants
- Environmentally Optimistic Computing

Chemicals and Pharmaceuticals

- Nanotechnology-based active sunscreen

Manufacturing

- Passive smart windows

National Security

- Nuclear detection and forensics

General Technologies

- Adjustable acoustics
- Optimum design of structures for crashworthiness considered

Each student is assigned an adviser from the time of enrollment. The individual Thesis director will be chosen as soon as practicable.

Thesis directors are normally chosen from the teaching and research faculty of the College of Science or the College of Engineering. There also may be co-directors chosen from the faculty outside (or within) the two Colleges. In exceptional cases, a student may choose a project director from the Notre Dame teaching and research faculty outside the two Colleges. Such arrangements must be approved by the Director of the ESTEEM Program.

Master's Examination

Master's Requirements

By the end of the summer semester, the degree candidate must have taken a master's examination demonstrating mastery the student's field. This will consist of a Thesis describing the science and/or

engineering invention(s) and the detailed plan for the development of the intellectual property associated with the student's project and an oral examination by a three-person committee composed of members of the faculty from the College of Engineering, College of Science and Mendoza College of Business. Failure in either one or both parts of the examination results in automatic forfeiture of degree eligibility, unless the Director of the ESTEEM Program recommends a retake. If a retake is recommended, it must be completed by the end of the following semester. The ESTEEM Program allows only one retake of the master's examination.

Admission to Candidacy

To qualify for admission to candidacy, a student must be in the ESTEEM Master's Degree program. The student must have been enrolled in the program without interruption and must maintain a minimum cumulative GPA of 3.000 in approved course work. A student who seeks admission to candidacy in the ESTEEM program must also demonstrate business research capability and receive ESTEEM program approval of his or her project proposal.

Admission to candidacy is a prerequisite to receiving the ESTEEM Master's Degree.

Thesis Requirement

The Thesis is the distinctive requirement of the ESTEEM program. With the approval of the student's Thesis Director, the student proposes a Thesis topic for ESTEEM program approval. The approved topic is researched and the results presented under the supervision of Thesis Director.

The Thesis Director indicates final approval of the Thesis and its readiness for the readers by signing the Thesis. The candidate then delivers signed copies of the completed Thesis to the Director of the ESTEEM Program. These copies are distributed to the three official readers appointed by ESTEEM program. Readers are appointed from among the regular teaching and research faculty and professional specialists of the College of Science, College of Engineering and the Mendoza College of Business. The Thesis Director may not be one of the official readers. Each reader must unconditionally approve the Thesis.

Submitting the Thesis

The format of the thesis should follow the guidelines established by ESTEEM program. These guidelines will be updated and published periodically.

When the Thesis is given to the readers, the ESTEEM program will also perform a preliminary review of the format.

After the readers approve the Thesis and after any necessary changes have been made, the candidate must then present the final version of the Thesis to the ESTEEM program for final approval.

4. Grades

Masters of Science students must maintain a 3.0 or “B” average on the University of Notre Dame’s 4.0 grading scale. Students whose GPA falls below 3.0 will be placed on academic probation.

The Grade Point Average (GPA) weights grades for graduate students as follows:

A	4
A-	3.667
B+	3.333
B	3
B-	2.667
C+	2.333
C	2
F	0
I	“Incomplete” – counts as 0 pending removal of the incomplete grade
NR	No grade reported
S	No points – this is a “Satisfactory” grade
U	No points – this is an “Unsatisfactory” grade
V	No points – this indicates “Audit” status
W	No points – the student withdrew from the course

Quality point values are used to compute the student’s GPA. The GPA is the ratio of accumulated earned quality points to the accumulated earned semester credit hours. GPA computation takes into account only those grades earned in Notre Dame graduate courses by students with graduate status at Notre Dame. For courses taken outside the University, the grade will not be included in the GPA computation.

The grades of C- and D are not awarded in the ESTEEM program or Graduate School.

A student receives the temporary grade of I when, for reasons approved by the Director of the ESTEEM Program, a student has not completed the requirements for a 60000- or higher-level graduate course within the semester. No grade of I can be given for courses below the 60000 level or to ESTEEM students in the of final summer session of the ESTEEM degree program.

The student then must complete the course work for a grade prior to the beginning of the final examination period of the next semester in which the student is enrolled.

The University temporarily computes this grade as the equivalent of an F in calculating the GPA. When the student fulfills the above requirements, the I is replaced by the new grade. Faculty will be given 30 days from the last day of classes to turn in the grade change form to the Graduate School. Should the student not complete the course work as required, the I will convert to an F on the transcript.

The ESTEEM Program will review a student who receives more than one I in a semester or an I in two or more consecutive semesters, to determine the student’s eligibility for continued support and enrollment.

The grades of S and U (Satisfactory and Unsatisfactory) are used in courses without semester credit hours, as well as in research courses, departmental seminars, colloquia, workshops, directed studies, field education, and skills courses. These courses, if given the grade of S, do figure in a student’s earned semester credit-hour total but do not figure in the computation of the GPA. A grade of U will not count toward the student’s earned semester credit-hour total, nor will it figure in the computation of the GPA.

The grade of V (Auditor) has neither quality-point nor credit-hour value. It is the only grade available to the registered auditor. The audit must be requested before the seventh class day of the semester; the

auditor should attend the course throughout the entire semester, and it is made part of the student's permanent record. The grade of V cannot be changed to a credit-earning grade. Information about declaring an audit is posted at <http://registrar.nd.edu/audit.shtml>.

The grade of W (Discontinued with permission) is given for a course that a student drops after the mid-semester point with the permission of the Director of the ESTEEM Program.

5. Academic Integrity/ESTEEM Code of Honor

Integrity in scholarship and research is an essential characteristic of our academic life and social structure in the University. Any activity that compromises the pursuit of truth and the advancement of knowledge besmirches the intellectual effort and may undermine confidence in the academic enterprise. A commitment to honesty is expected in all academic endeavors, and this should be continuously emphasized to students, research assistants, associates, and colleagues by mentors and academic leaders.

The procedures for ensuring academic integrity in the ESTEEM Program are distinct from those in the [Academic Code of the Graduate School](#). The following apply to ESTEEM students.

Violations of academic integrity may occur in classroom work and related academic functions or in research/scholarship endeavors. Classroom-type misconduct includes, but is not limited to, the use of information obtained from another student's paper during an examination, plagiarism, submission of work written by someone else, falsification of data, etc. Violation of integrity in research/scholarship includes, but is not limited to, deliberate fabrication, falsification, or plagiarism in proposing, performing, or reporting research or other deliberate misrepresentation in proposing, conducting, reporting, or reviewing research. Misconduct does not include errors of judgment, errors in recording, selection, or analysis of data, differences in opinions involving interpretation, or conduct unrelated to the research process. Misconduct includes practices that materially and adversely affect the integrity of scholarship and research.

Any person who has reason to believe that a violation of this policy has occurred shall discuss it on a confidential basis with the Director of the ESTEEM Program. If a perceived conflict of interest exists between the Director and the accused, the next highest academic officer shall be notified of the charge. The Director shall evaluate the allegation promptly. If it is determined that there is no substantial basis for the charge, then the matter may be dismissed with the fact of dismissal being made known to the complainant and to the accused if he or she is aware of the accusation. A written summary of charges, findings, and actions shall be forwarded to the Deans of the College of Engineering and the College of Science as a matter of documentation. Otherwise, the Director will select an impartial panel consisting of three members, one of whom may be a graduate student, to investigate the matter. The Director will inform the accused of the charges. The panel will determine initially whether to proceed directly to a hearing to further investigate the case, or to dismiss the charges. If the panel decides to proceed directly to a hearing, the hearing will be held within 10 days of the original notification. If the panel decides that further investigation is necessary, it shall immediately notify the Director. If it decides that a hearing is not warranted, all information gathered for this investigation will be destroyed. The utmost care will be taken to minimize any negative consequence to the accused.

The accused party must be given the opportunity to respond to any and all allegations and supporting evidence at the hearing. The response will be made to the appointed panel. The panel will make a final judgment, recommend appropriate disciplinary action, which may include a recommendation of dismissal from the University for a serious violation, and report to the Director in writing. The report will include all of the pertinent documentation and will be presented within 30 days after meeting with the accused. Copies of the report are to be made available to the accused, the Director, and the Deans of the College of Engineering and the College of Science. If a violation is judged to have occurred that involves externally funded research/scholarship, the Director might report the violations to the sponsor of the research effort (e.g., NSF, NIH, Lilly Foundation, etc.), if appropriate.

If the student chooses to appeal, he or she must address the appeal in writing to either the Dean of the College of Engineering or the Dean of the College of Science within 10 days. The student has the right to appear before the Dean or his or her delegates. The Dean may decide to appoint an ad hoc committee to handle this appeal, if deemed necessary.

Students who are working on externally sponsored programs may also be covered by sponsor-mandated rules. Contact [Dr. Richard A. Hilliard](#), director of research compliance, (574) 631-5386, for further information.

The penalty for a student who admits wrongdoing should be determined by the impartial panel or the Director of the ESTEEM Program as appropriate.

Intellectual Property Guidelines:

Background

The ESTEEM Program is a new paradigm for educating science and engineering students to develop new product and process concepts from basic science, engineering, and high technology knowledge. This unique curriculum focuses on translating science and engineering knowledge into products with great societal value through entrepreneurship and the development of business acumen.

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Innovation in the areas of technology and management in science and engineering has been the dominant source of productivity gains and new enterprises in the United States economy over the last fifty years, accounting for as much as fifty percent of U.S. economic growth. In our increasingly complex, technologically oriented economy, professionals who are deeply grounded in science and technology and have the expertise to manage human, financial, and technological capital are sorely needed.

Intellectual Property Rights

The capstone course in the ESTEEM Program is a 12 credit project. The student will normally work with a Notre Dame Faculty member to develop commercialization plans for intellectual property that the faculty member has developed in his/her role at the University of Notre Dame. The result of this project will be a thesis incorporating an evaluation of the technology and a business plan for commercialization of the assigned Intellectual Property. By accepting admission to the ESTEEM program, ESTEEM students acknowledge that:

- They are bound by the Intellectual Property Policy at the University of Notre Dame as it is applied to graduate students at the University.
- The above obligation applies to all Intellectual Property arising from any student ESTEEM project involving Intellectual Property utilized by the student as a component of the ESTEEM Program and to which the University of Notre Dame claims rights under the Policy.
- In the rare event that the University of Notre Dame does not claim rights to intellectual property that forms the basis of the student's ESTEEM project, the Intellectual Property Policy of the University of Notre Dame will not apply.
- The full policy can be found on the [University of Notre Dame Office of Research](#).

6. Academic Freedom, Respect and Tolerance

The ESTEEM Program and the University of Notre Dame are committed to the free expression and interchange of ideas. Such freedom can only flourish in atmosphere in which respect for persons of all racial, ethnic, religious, gender, sexual, national and political backgrounds is guaranteed. As such the ESTEEM Program assumes an attitude of tolerance toward all persons and viewpoints in the M.S. program, and expects civility in all circumstances on the part of students, faculty, staff, and fellows. The ESTEEM Program abides by University policies prohibiting sexual and discriminatory harassment and harassment in general, on and off campus.

For details on policies, please see [du Lac: A Guide to Student Life](#).

7. Further Notes on the ESTEEM Program and Notre Dame Policies

- a. Degree Eligibility
Failure to complete all requirements for the master's degree within three years results in forfeiture of degree eligibility.

- b. Admission to Candidacy
Applicants for admission to the ESTEEM Program must hold a bachelor's of science (B.S.) degree in the sciences or engineering or its equivalent from an accredited American college or university or from a foreign institution of acceptable standing by the time of graduate matriculation, or admission is void. The applicant should have earned at least a B average in his or her undergraduate major courses and should meet a level of academic achievement that implies a developed ability for advanced study and independent scholarship.

An applicant should seek admission as a degree-seeking student in the master's program.

Admission to a graduate degree program is not equivalent to admission to candidacy for the degree. (See "Admission to Candidacy," under master's degree requirements).

- c. Acceptance
Official acceptance to the ESTEEM Program is granted only by the ESTEEM Admissions Committee. Applicants will be informed officially of the results of their application by a letter from the Director of the ESTEEM Program. Applicants who intend to accept offers of admission are required to confirm their acceptance by returning the appropriately completed form that is supplied with an offer of admission.

- d. Foreign Language Requirement
The ESTEEM program does not require foreign language reading proficiency for the master's degree.

- e. Add/Drop Policy
A student may add courses through the first seven class days of the semester in the manner prescribed by the University Registrar. A student may add courses after this time with approval of the Director of the ESTEEM Program, in the manner prescribed by the University Registrar.

A student may drop elective courses at the student's discretion through the first seven class days of the semester. To drop a course after this period and up to the official last day for course discontinuance as prescribed by the University Registrar, a student must have the approval of the Director of the ESTEEM Program. A course may be dropped after the last date for course discontinuance only in cases of serious physical or mental illness. Courses dropped after this period will be posted on the student's permanent record with the grade of W.

- f. Transfer Credits
The ESTEEM Program may accept course work completed at another accredited university toward meeting its degree requirements. A student may transfer credits earned at another accredited university only if: (1) the student is in graduate-level, degree-seeking status at Notre Dame; (2) the courses taken are graduate courses appropriate to the Notre Dame ESTEEM Program as determined by the Director of the ESTEEM Program; (3) the courses were completed within a five-year period prior to admission to the ESTEEM program at Notre Dame (4) the student earned a grade of B (3.0 on 4.0 scale) or better; and (5) the transfer is approved by the Director of the ESTEEM Program.

These five requirements also apply to the transfer of credits earned in another program at Notre Dame.

The University considers a request for credit transfer only after a student has completed one semester in a Notre Dame graduate degree program and before the semester in which the graduate degree is conferred. The university of origin must submit two transcripts directly to the ESTEEM Program. Credits not earned on the semester system, such as trimester and quarter-hour credits, will be transferred on a pro rata basis.

A student transferring from an unfinished master's program may not transfer more than six semester credit hours into the ESTEEM Program.

No grades of transferred courses are included in the student's GPA.

g. Enrollment

Once admitted, all ESTEEM graduate students must enroll and register each semester at the dates and times announced by the University Registrar. Any admitted student who fails to register and enroll for one semester or more must apply for readmission upon return.

h. Continuous Enrollment

All students must enroll each semester in the academic year and register for at least one credit hour per semester to maintain student status. Continuous enrollment is met normally by both enrollment in the University and registration in a graduate-level course relevant to the ESTEEM program. Any exception to this rule, including a leave of absence, must be approved by the Director of the ESTEEM Program (See "Leave of Absence," below).

A student who fails to enroll and register for one semester or more must apply for readmission upon return.

i. Leave of Absence

For exceptional reasons and on the recommendation of the Director- ESTEEM Program, a student in good academic standing may request a leave of absence for a maximum of two consecutive semesters. A request for a leave of absence must be made before the semester in which the leave is taken, and all leaves of absence must be approved by the Director of the ESTEEM Program. If, for some urgent reason, a student must leave the University after the student has enrolled for the semester, the withdrawal procedure below must be followed. If at the end of the approved leave of absence period the student does not return, the student is considered terminated. Application for readmission is required if the student wishes to return. See the Registrar's [leave of absence page](#) for more information.

In the case of a medical leave of absence, clearance from the University Health Center is required prior to readmission.

j. Medical Separation from Academic Duties

Students enrolled in the ESTEEM Program who wish to temporarily interrupt their programs for medical reasons must apply to the ESTEEM Program for permission. Students are eligible under this policy if they have a "serious medical condition." For purposes of this policy, "serious medical condition" means a medical condition that (1) requires multiple-day hospitalization OR (2) renders the student unable to engage in coursework and all other ESTEEM Program-related duties for a period of at least 10 calendar days. Certification by a physician that the student has a serious medical condition as defined in this policy must be submitted to the ESTEEM Program no less than three months prior to the separation period (for childbirth and other predictable requests) or as soon as the need is foreseen (for emergency requests). In situations involving childbirth, the separation period will generally begin on the actual date of childbirth; in all cases, regardless of the nature of the medical condition, the duration of the separation will be as certified by the physician up to a maximum of six weeks. Students may utilize this medical separation policy two nonconsecutive times during their graduate studies. Should students need more than six weeks at any one time, they must withdraw from the University. Leaves of absence for one semester or

more for medical or other reasons are governed by the ESTEEM Program Leave of Absence policy.

Students will retain their tuition scholarships, access to on-campus medical facilities, and all other resources available to students during the entire separation period (up to six weeks). Students also will be deemed "continuously enrolled" at the University during the entire period of separation.

Students taking classes will be required to make arrangements with individual course instructors for completion of any courses in progress during the leave. Students will be granted the option to reschedule exams or extend candidacy deadlines or other deadlines not discussed herein. Students are responsible for making arrangements to reschedule exams, extend deadlines, and to make up other work not discussed herein. Unlike a regular one-semester leave, time off in conjunction with this policy will count toward the students' degree time limit of eight years and University-sponsored funding cap of six years.

a. Withdrawal

Any student in the ESTEEM Program who at any time within the school year wishes to withdraw from the University should contact the Office of the Registrar. To avoid failure in all classes for the semester and in order to receive any financial adjustment, the withdrawing student must obtain the appropriate clearance from either the Dean of the College of Engineering or Dean of the College of Science and the Director of the ESTEEM Program and from the assistant vice president for residence life if the student is utilizing University housing.

On the first day of classes, a full tuition credit will be made. Following the first day of classes, the tuition fee is subject to a prorated adjustment/credit if the student: (1) withdraws voluntarily for any reason on or before the last day for course discontinuance at the University; or (2) is suspended, dismissed, or involuntarily withdrawn by the University, for any reason, on or before the last day for course discontinuance at the University; or (3) is later obliged to withdraw because of protracted illness; or (4) withdraws involuntarily at any time because of military service, provided no credit is received for the classes from which the student is forced to withdraw.

Upon return of the student forced to withdraw for military service, the University will credit the student's account for that portion of tuition charged for the semester in which he or she withdrew and did not receive academic credit.

Room and board charges will be prorated throughout the entire semester.

Students receiving University and/or Federal Title IV financial assistance who withdraw from the University within the first 60 percent of the semester are not entitled to the use or benefit of University and/or Federal Title IV funds beyond their withdrawal date. Such funds shall be returned promptly to the entity that issued them, on a pro rata basis, and will be reflected on the student's University account.

This withdrawal regulation may change subject to federal regulations. Examples of the application of the tuition credit calculation are available from the Office of Student Accounts upon request.

b. Maximum Course Load

During each semester of the academic year, a graduate student should not register for more than 12 credit hours of graduate courses, i.e., the 60000 through 90000-level courses. In the summer session, an ESTEEM student should generally not register for more than 6 credit hours. Any exceptions to this rule must be approved by the Director of the ESTEEM Program.

c. Changes in Student Class Schedules

A student may add courses only during the first seven class days of each semester. Courses may be added after this time only upon the recommendation of the Director of the ESTEEM Program. A student may also drop courses during the first seven days of the semester. To drop a course after this period and up to the mid-semester point (indicated on the Graduate School calendar), a student must have the approval of the Director of the ESTEEM Program. A course may be dropped after the mid-semester point only in cases of serious physical or mental illness. Courses dropped after the mid-semester point will be posted on the student's permanent record with the grade of "W." A course taken for credit can be changed to an audit course after the mid-semester point also only in cases of serious physical or mental illness.

d. Full and Part Time Students

A full-time student is one who is working full-time toward his or her degree objective. The Director of the ESTEEM Program is responsible for determining who is a full-time student.

All degree seeking students are expected to maintain full-time status and to devote full-time to graduate study. No degree student may hold a job, on or off campus, without the express permission of the Director of the ESTEEM Program.

e. Official Transcripts

Official transcripts of grades may be obtained without charge from the Office of the University Registrar by submitting the appropriate form. Grades are recorded on the transcripts as described in the section on Grading, above. The grades of "S" and "U" (satisfactory and unsatisfactory) are used in colloquia students might participate in through other departments, special workshops, directed studies, and internship experiences. These courses do not count in the computation of the GPA. The grade of "V" appears where a class has been audited (in which a student sits in on the class but does not take tests or receive grades or credits). "W" is given for withdrawal after the mid-semester point, as described above.

f. Incomplete

A graduate student may receive the temporary grade of "I" when, for reasons approved by the Director of the ESTEEM Program, he or she has not completed the requirements for a graduate level course within the semester period. A student who receives the temporary grade of "I" must complete the coursework for a grade prior to the beginning of the final examination period of the next semester in which he or she is enrolled. Should the student not complete the coursework to remove an "I" grade, the incomplete grade will convert to an "F" (failing). An "I" cannot be given in the final semester of the program. The Institute and the Graduate School may review the performance of a student who receives more than one "I" in a semester or an "I" in two or more semesters to determine his or her eligibility for continued enrollment and support. Note that the grade of "I" should be requested only in extraordinary circumstances; the Eck Institute does not consider the "I" an advisable option for graduate students in our intensive M.S. program.

g. Academic Good Standing

Continuation in the ESTEEM program, admission to degree candidacy, and graduation require maintenance of at least a 3.0 (B) cumulative grade point average (GPA), calculated using the standard University grading scale as defined in the Academic Code and reproduced below. A student may be dismissed from the program if the student's GPA in any one semester is below 2.5 or if the student's GPA is below 3.0 for two consecutive semesters.

An adequate GPA is only one factor taken into consideration in determining a student's qualifications for an advanced degree. ESTEEM students should be aware of the Program's performance criteria.

A student must be in academic good standing to be eligible for continued financial support.

h. ESTEEM Program Grievance Process

Appeals of decisions related to academic matters, grievances of course grades or conduct, conflicts between students and advisors, or other issues that affect a student's degree progress will be addressed by the Director of the ESTEEM Program. A student who wishes to file a formal grievance or appeal should do so in writing to the Director of the ESTEEM Program. The student should indicate the nature of the problem, the date(s) the problem occurred, the grounds upon which the appeal is based, background information that the student considers important and the relief requested. The matter will then be submitted to the Director of the ESTEEM Program, and acted on in no more than 15 working days. If the student feels the resolution is inadequate, they may appeal the decision to the Dean of the College of Engineering or the Dean of the College of Science by following the ESTEEM student appeal procedure as follows.

ESTEEM Student Appeal Procedure

The purpose of the procedure is to afford ESTEEM students at Notre Dame the opportunity to resolve complaints dealing with academic issues such as dismissal from graduate standing, placement on probationary status, denial of readmission to the program (if the student was previously in good standing), and other program decisions that terminate or impede progress toward the degree.

This procedure is not to be used to address issues of sexual or discriminatory harassment (see du Lac), or academic fraud (see ESTEEM program 'Academic Integrity'), or for disability-related grievances (see the grievance procedure for students with disabilities in du Lac).

This procedure is provided for continuing and returning graduate students in the ESTEEM Program.

ESTEEM Program Resolution Process

Conflicts should be resolved at the lowest level, i.e., within the ESTEEM Program, according to the ESTEEM Grievance Process as defined above.

For complaints originating in the ESTEEM Program, the student must first attempt resolution within the program by following the program's grievance procedure. If a mutually satisfactory resolution cannot be reached at the program level, the complaint may be brought to the Dean of Engineering or the Dean of Science according to the following procedure.

Formal Appeal Procedure to the Dean of Engineering or Dean of Science

Complaints must be initiated by a written statement from the student to one of the Deans, indicating the nature of the problem, the date(s) the problem occurred, the grounds upon which the appeal is based, background information that the student considers important and the relief requested. All appeals must be filed within 30 days of the conclusion of the ESTEEM Program Grievance Process. The Dean will request from the Director of the ESTEEM Program a description of the results of the departmental resolution process.

Grounds for formal appeal include procedural error, violation of official policy by academic or administrative personnel, or special mitigating circumstances beyond the student's control that were not properly taken into account in a decision affecting the student's academic progress.

The complaint should be sent to the Dean within 30 days of the ESTEEM Grievance Process resolution. The Dean will then convene a meeting of an *ad hoc* academic appeals committee, composed of three faculty members chosen by the Dean, two of whom will be current members of the Graduate Council (one from the College of Engineering and one from the College of Science) and one of whom will be from the one these colleges but not a member of the Graduate Council. The committee will also include one non-voting graduate student. This student may either be one of the current GSU representatives to the Graduate Council or a substitute from one of these colleges selected by the Dean from a pool of students identified by the GSU. The committee will be chaired by the Dean, who does not vote. At the student's request or by request of the committee, the appeals committee will also meet with the student. The committee may also meet with other individuals involved.

The appeals committee will make a written recommendation to the Dean within 30 working days of receipt of the appeal. The Dean may or may not accept this recommendation, but in either case, the Dean will respond to the appeal in writing within 30 working days of receipt of the committee's recommendation. (All deadlines set forth here may be extended in extenuating circumstances.) The dean will send a copy of this letter to the Director of the ESTEEM Program. The judgment of the Dean is final.

i. Access to Computing Services

The University of Notre Dame NetID accounts and related services are intended for faculty, staff, and currently registered and enrolled students. "A student must register and enroll at the dates and times announced by the Registrar" (*Academic Code 4.1*). A student who fails to register and enroll by the announced date will forfeit the right to access his or her NetID account and related services. University computing resources supplied by way of the NetID are normally available to a student for up to 60 days after his or her graduation date. A student granted a leave-of-absence would normally retain access to University computing services for up to two semesters.

An ESTEEM student who is separated from the University due to an academic suspension, academic dismissal, or withdrawal will no longer have access to University computing services unless an extension has been approved by either the Dean of the College of Science or the Dean of the College of Engineering. A student attending Notre Dame for the summer only, with a non-degree seeking status, will normally retain access to University computing service for up to 60 days after the August graduation date. A student who is separated from the University for other reasons will no longer have access to University computing services.

8. Note on Discrepancies

Where there may be an inadvertent discrepancy between this manual and the University of Notre Dame's [Academic Code of the Graduate School](#), the Academic Code takes precedence. Students are urged to consult the Academic Code for further information on specific topics summarized in this set of guidelines, and for further information on being a graduate student at the University of Notre Dame.

9. Faculty of the ESTEEM Program

College of Engineering, Faculty

Hsueh-Chia Chang	The Bayer Professor of Chemical Engineering
Nitesh Chawla	Associate Professor, Computer Science and Engineering
Patrick Flynn	Professor, Concurrent Professor, Electrical Engineering
Jason Hicks	Assistant Professor, Chemical and Biomolecular Engineering
Scott Howard	Assistant Professor, Electrical Engineering
Jeffrey Kantor	Professor, Chemical and Biomolecular Engineering
Ahsan Kareem	The Robert M. Moran Chair in Engineering, Professor
Tracy Kijewski-Correa	The Rooney Family Chair in Engineering, Associate Professor, Fellow
Peter Kilpatrick	Matthew H. McCloskey Dean of the College of Engineering
Michael Lemmon	Professor, Electrical Engineering
Edward Maginn	Professor, Department Chair, Chemical and Biomolecular Engineering
Mark McCready	Associate Dean of Research and Graduate Studies
Glen Niebur	Professor, Aerospace and Mechanical Engineering
Timothy Ovaert	Professor, Aerospace and Mechanical Engineering
William Phillip	Assistant Professor, Chemical and Biomolecular Engineering
Christian Poellabauer	Associate Professor, Computer Science and Engineering
Thomas Pratt	Research Associate Professor, Electrical Engineering
Flint Thomas	Professor, Aerospace and Mechanical Engineering

College of Science, Faculty

Mark Alber	The Vincent J. Duncan Family Professor of Applied Mathematics
Steven Buechler	Professor, Department Chair, Applied Computational Mathematics & Statistics
Gregory Crawford	The W.K. Warren II Chair, Professor, Dean, College of Science
Crislyn D'Souza-Schorey	Walther Cancer Institute Chair I, Professor
Paul Helquist	Professor, Associate Chair, Chemistry and Biochemistry
Alan Huebner	Assistant Professional Specialist, Applied Computational Mathematics & Statistics
Masaru Kuno	Associate Professor, Chemistry and Biochemistry
Shaun Lee	Assistant Professor, Biological Sciences
Marya Lieberman	Associate Professor, Chemistry and Biochemistry
Lynette Prezyna	Associate Professional Specialist, College of Science
Zachary Schafer	Assistant Professor, Biological Sciences
Robert Stahelin	Adjunct Associate Professor, Chemistry and Biochemistry
Fr. Tom Streit, CSC	Founder and Principal Investigator, Notre Dame Haiti Program
Mark Suckow	Director, Research Professor
Richard Taylor	Associate Dean for Research, Professor Chemistry and Biochemistry

College of Business, Faculty

Wendy Angst	Associate Professor, Management
Jeffrey Bernel	Director of Gigot Center, College of Business Gigot Center
Sandra Collins	Associate Professional Specialist, Management
Alex Himonas	Professor, Mathematics
David Hutchinson	Associate Professional Specialist, Finance
Tonia Hap Murphy	Associate Teaching Professor
James O'Rourke	Professional Specialist, Arthur F. & Mary J. O'Neil Director
Michael Whitt	Associate Professional Specialist, Management

Other Key Instructors

Thomas Cosimano	Professor of Finance
David Murphy	Associate Dean of Entrepreneurship