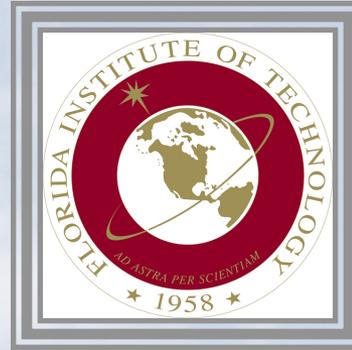


# Welcome to the Online Catalog

The online catalog management system (*Acalog*<sup>™</sup>) contains a number of features to assist you, including advanced search options, intuitive navigation and a My Personal Catalog feature to store favorite programs and courses. For more information, contact the Catalog Editor, [catalog@fit.edu](mailto:catalog@fit.edu).

# catalog.fit.edu



Firefox File Edit View History Bookmarks Tools Window Help

Worlds Tech - Catalog AC

catalog.fit.edu

Most Visited Getting Started CANVAS Catalog Mgr JCMS UCCC Catalog Publisher Xrender Hemingway Fac Sense Weave EdanzCredit

Log in Apply Now | Calendar | Access Florida Tech | Directory | Site Map | Give Now

Florida Institute of Technology  
High Tech with a Human Touch™

About Florida Tech Academics Research Campus Life Athletics Admissions

Search Catalog  
Advanced Search

Catalog Home  
Presidents' Welcome  
Degree Programs  
Course Descriptions  
Institution Overview  
Financial Overview  
Academic Overview  
College of Aeronautics  
Nathan M. Bisk College of Business  
College of Engineering  
College of Psychology and Liberal Arts  
College of Science  
School of Human-Centered Design, Innovation & Art  
Personnel Directory  
References  
My Personal Catalog

## 2015-2016 Catalog



### Mission Statement

With our focus on student success, Florida Institute of Technology's mission is to provide high-quality education to a culturally diverse student body in order to prepare students for entering the global workforce, seeking higher-education opportunities, and serving within their communities. The university also seeks to expand knowledge through basic and applied research and to serve the diverse economic, cultural, and societal needs of our local, state, national and international constituencies.

In support of this mission, we are committed to:

- Fostering and sustaining a productive institutional culture of assessment leading to the continuous improvement of academic and administrative programs in order to promote student development;
- Developing an organizational culture that values and encourages intellectual curiosity, a sense of belonging and shared purpose among faculty, students and staff, and the pursuit of excellence in all endeavors;
- Recruiting and developing faculty who are internationally recognized as educators, scholars and researchers;
- Achieving recognition as an effective, innovative, technology-focused educational and research institution;
- Recruiting and retaining an excellent, highly select and culturally diverse student body;
- Continually improving the quality of campus life for all members of the university community;
- Providing personal and career growth opportunities for both traditional and nontraditional students and members of the faculty and staff;
- Securing and maintaining professional accreditation for all appropriate programs.

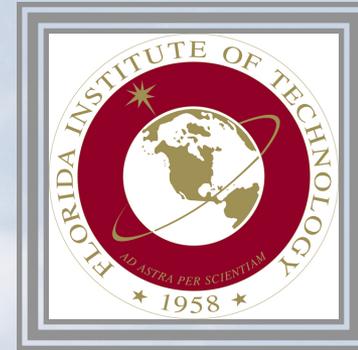
[www.fit.edu](http://www.fit.edu)  
For information, or to arrange for a campus visit:  
Call toll free (800) 888-4348 (Undergraduate Admission) or (800) 944-4348 (Graduate Admissions)  
or fax (321) 723-9468  
Write to Florida Institute of Technology, 150 West University Boulevard, Melbourne, FL 32901-6975  
Email [admission@fit.edu](mailto:admission@fit.edu) (Undergraduate Admission) or [Grad.Admissions@fit.edu](mailto:Grad.Admissions@fit.edu) (Graduate Admissions)

This catalog contains current information regarding curricula, educational plans, offerings and requirements of the colleges and schools, including the Graduate School, and may be altered from time to time to carry out the purposes and objectives of the university. The provisions of this catalog do not constitute a contract between the university and the enrolled student. The university reserves the right to change any provision, offering, requirement or fee at any time.

A student may be required to withdraw (under appropriate procedures) whenever it is deemed to be in the best interest of the student and/or the university. The university may impose probation on any student whose conduct is unsatisfactory. Any admission based on false statements or documents presented by the student is void when the fraud is discovered, and the student is not entitled to credit for work that may have been completed. When a student is dismissed or suspended from the university for cause, there will be no refund of tuition and fees paid. If a dismissed student has paid only a part of the tuition and fees, the balance due the university will be collected. There will be no refund of tuition, fees or other payments made in the event the operation of the university is suspended as a result of any act of God, strike, riot, disruption or for any other reason beyond the control of the university.

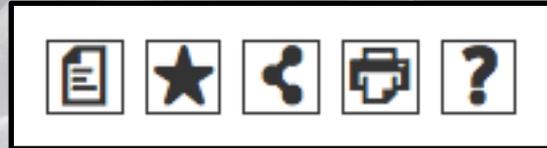
Florida Institute of Technology does not discriminate on the basis of race, gender, color, religion, creed, national origin, ancestry, marital status, age, disability, sexual orientation, Vietnam-era veterans status or any other discrimination prohibited by law in the admission of students, administration of its educational policies, scholarship and loan programs, employment policies, and athletic or other university-sponsored programs or activities.

Florida Institute of Technology



- [Search Catalog](#) 
- [Advanced Search](#)
- [Catalog Home](#)
- [Presidents' Welcome](#)
- [Degree Programs](#)
- [Course Descriptions](#)
- [Institution Overview](#)
- [Financial Overview](#)
- [Academic Overview](#)
- [College of Aeronautics](#)
- [Nathan M. Bisk College of Business](#)
- [College of Engineering](#)
- [College of Psychology and Liberal Arts](#)
- [College of Science](#)
- [School of Human-Centered Design, Innovation & Art](#)
- [Personnel Directory](#)
- [References](#)
- [My Personal Catalog](#)

**From the Catalog Home page, you can choose any area you'd like to view: degree programs, college/school information, course descriptions or your own My Personal Catalog, where you store all those items you'll need to see again.**



**The series of special icons at the top of the page let you: Print Degree Planner, save to My Personal Catalog, share on Facebook or Twitter, send the program to the printer or ask for help.**

## Engineering Management, M.S.



Major Code: 8075

Degree Awarded: Master of Science

Age Restriction: N

Admission Status: graduate, main campus, Extended Studies

Delivery Models: classroom

Location/s: main campus, Aberdeen, Hampton Roads, Northeast, Orlando, Patuxent,, Redstone/Huntsville

Admission Materials: 3 letters of recommendation, résumé, objectives, GRE

The Master of Science in Engineering Management meets the professional needs of the engineer who, although working in a technical field, finds it necessary to update his or her skills in engineering, as well as acquire knowledge in the management of other engineers. Typically, engineers find that as they advance in their chosen fields, the challenges of management increasingly play a role in the overall responsibilities of the position. Many find their careers would best be served by a program addressing the management challenges of their job responsibilities. This interdisciplinary program is designed for those individuals.

### Admission Requirements

An applicant for the master's program in engineering management should have a bachelor's degree from an ABET-accredited engineering program, though applicants with bachelor's degrees in physical sciences, computer science or mathematics will also be considered. Applicants who have an undergraduate GPA of less than 3.0 on a 4.0 scale may be asked to submit two letters of recommendation, a résumé, a statement of objectives and GRE results. All students are required to have a combined verbal/quantitative GRE score of 300 or higher (using the 130-170 point per part scoring system).

International applicants for whom English is not their primary language must submit paper-based TOEFL scores of 550 (or the equivalent computer- or Internet-based scores) or higher in addition to the GPA requirement.

General admission requirements and the process for applying are presented in the [Academic Overview](#) section.

### Degree Requirements

The degree requires a minimum of 30 semester credit hours. Students without adequate undergraduate courses in linear and matrix algebra, calculus, probability theory and/or statistics will be required to make up these deficiencies. Courses taken to satisfy these deficiencies or any other admission prerequisites cannot be counted toward the degree requirements. Thesis students must complete a minimum of six semester credit hours of thesis ([ENM 5999](#)). More credit hours may be necessary to satisfactorily complete the thesis requirements, but only six may be counted toward the degree requirements. Nonthesis students must pass a final program examination during their final semester before graduation.

General degree requirements are presented in the [Academic Overview](#) section.

### Curriculum

The master of science degree program consists of a set of required core courses and a set of elective courses as outlined below. Students who are newly admitted to the program must submit a program plan of study and have that program plan approved by their designated advisor and department head before registering for any course to be applied toward graduation requirements. Students must not register for any courses not on their approved program plan without the approval of their advisor and department head. Students pursuing this degree as a second or subsequent graduate degree must complete the change of major process and new program plan at least two semesters before graduation and no later than four weeks after starting the program. Only graduate courses in engineering, physical sciences, computer science or mathematics may be counted as transfer credit from the first graduate degree program.

There are five required core courses that all students must take, as listed below. Nonthesis students must take an additional five elective courses, subject to the restriction shown. Thesis students will substitute six semester credit hours of thesis for two elective courses.

### Required Courses

#### Complete:

- [ENM 5100 Quality Engineering](#)
- [ENM 5200 Project Engineering](#)
- [ENM 5300 Topics in Engineering Operations and Logistics](#)
- [ENM 5420 Technology Commercialization Strategies](#)
- [ENM 5430 Strategic Situation Analysis Using Game Theory](#)

#### Elective Courses

A comprehensive list of elective courses is maintained by the department and is available on the department's website. Students must choose the appropriate number of courses from this list (five for nonthesis students and three for thesis students) to meet their elective course requirement.



**View any degree program  
by navigating to “Degree  
Programs” or through the  
college/school.**

Student ID: \_\_\_\_\_  
Student Name: \_\_\_\_\_  
Adviser Name: \_\_\_\_\_

Catalog: 2015-2016 Catalog  
Program: Engineering Management, M.S.  
Minimum Credits Required: \_\_\_\_\_

## Engineering Management, M.S.

|   |   |
|---|---|
| Major Code: 8075  | Degree Awarded: Master of Science   |
| Age Restriction: N  | Admission Status: graduate, main campus, Extended Studies   |
| Delivery Mode/s: classroom  | Location/s: main campus, Aberdeen, Hampton Roads, Northeast, Orlando, Patuxent, Redstone/Huntsville |
| Admission Materials: 3 letters of recommendation, résumé, objectives, GRE |   |

The Master of Science in Engineering Management meets the professional needs of the engineer who, although working in a technical field, finds it necessary to update his or her skills in engineering, as well as acquire knowledge in the management of other engineers. Typically, engineers find that as they advance in their chosen fields, the challenges of management increasingly play a role in the overall responsibilities of the position. Many find their careers would best be served by a program addressing the management challenges of their job responsibilities. This interdisciplinary program is designed for those individuals.

### Admission Requirements

An applicant for the master's program in engineering management should have a bachelor's degree from an ABET-accredited engineering program, though applicants with bachelor's degrees in physical sciences, computer science or mathematics will also be considered. Applicants who have an undergraduate GPA of less than 3.0 on a 4.0 scale may be asked to submit two letters of recommendation, a résumé, a statement of objectives and GRE results. All students are required to have a combined verbal/quantitative GRE score of 300 or higher (using the 130-170 point per part scoring system).

International applicants for whom English is not their primary language must submit paper-based TOEFL scores of 550 (or the equivalent computer- or Internet-based scores) or higher in addition to the GPA requirement.

General admission requirements and the process for applying are presented in the Academic Overview section.

### Degree Requirements

The degree requires a minimum of 30 semester credit hours. Students without adequate undergraduate courses in linear and matrix algebra, calculus, probability theory and/or statistics will be required to make up these deficiencies. Courses taken to satisfy these deficiencies or any other admission prerequisites cannot be counted toward the degree requirements. Thesis students must complete a minimum of six semester credit hours of thesis (ENM 5999). More credit hours may be necessary to satisfactorily complete the thesis requirements, but only six may be counted toward the degree requirements. Nonthesis students must pass a final program examination during their final semester before graduation.

General degree requirements are presented in the Academic Overview section.

### Curriculum

The master of science degree program consists of a set of required core courses and a set of elective courses as outlined below. Students who are newly admitted to the program must submit a program plan of study and have that program plan approved by their designated advisor and department head before registering for any course to be applied toward graduation requirements. Students must not register for any courses not on their approved program plan without the approval of their advisor and department head. Students pursuing this degree as a second or subsequent graduate degree must complete the change of major process and new program plan at least two semesters before graduation and no later than four weeks after starting the program. Only graduate courses in engineering, physical sciences, computer science or mathematics may be counted as transfer credit from the first graduate degree program.

There are five required core courses that all students must take, as listed below. Nonthesis students must take an additional five elective courses, subject to the restriction shown. Thesis students will substitute six semester credit hours of thesis for two elective courses.

### Required Courses

#### Complete:

| Course Name   | Term Taken | Grade | Gen Ed |
|---|------------|-------|--------|
| ENM 5100 Quality Engineering                            |            |       |        |
| ENM 5200 Project Engineering                            |            |       |        |
| ENM 5330 Topics in Engineering Operations and Logistics |            |       |        |
| ENM 5420 Technology Commercialization Strategies        |            |       |        |
| ENM 5430 Strategic Situation Analysis Using Game Theory |            |       |        |

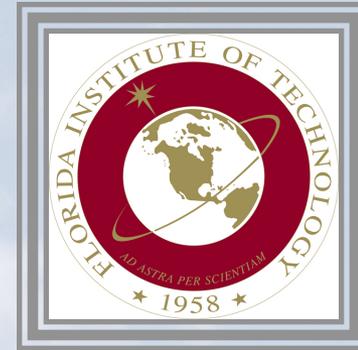
### Elective Courses

A comprehensive list of elective courses is maintained by the department and is available on the department's website. Students must choose the appropriate number of courses from this list (five for nonthesis students and three for thesis students) to meet their elective course requirement.

#### Notes:



Once you can see the degree program, select the icon at the top to "Print Degree Planner."



# Course Search

- Search by subject, prefix, number or keyword

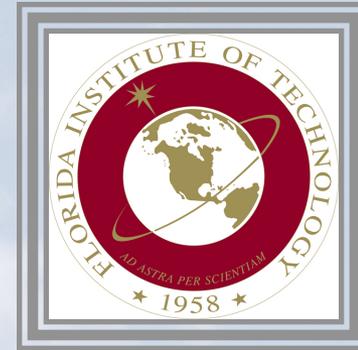
**Course Filter**

Filter this list of courses using course prefix, course code, keywords or any combination.

| Prefix:  | Code or Number:      | Type           | Keyword or Phrase:   |                                       |
|--|----------------------|----------------|----------------------|---------------------------------------|
| All prefixes... ▾  | <input type="text"/> | All types... ▾ | <input type="text"/> | <input type="button" value="Filter"/> |
| <input type="checkbox"/> Find whole word or phrase only. |                      |                |                      |                                       |

## Aviation Human Factors

- [AHF 3101 Introduction to Human Factors](#)
- [AHF 3102 Advanced Human Factors](#)
- [AHF 4001 Research Methods in Human Factors](#)
- [AHF 4302 Human-Automation Interaction](#)



# Course Descriptions

- Clicking on a course title opens it to the full description; clicking a second time closes it. Clicking on the prerequisite or corequisite shows that full description.

[BUS 2303 Macroeconomics](#)

---

## BUS 2303 Macroeconomics

Credit Hours: 3

Introduces the concepts that aid in understanding both aggregate economic conditions and the policy alternatives designed to stabilize national economies. Includes the determination of GDP and national income, inflation, unemployment, monetary policy, economic growth and exchange rates.

(SS)

Prerequisite: [MTH 0111](#) or [MTH 1011](#) or [MTH 1012](#) or [MTH 1000](#) or [MTH 1001](#) or [MTH 1002](#) or [MTH 1051](#) or [MTH 1603](#) or [MTH 1701](#) or [MTH 1702](#) or [MTH 1703](#) or [MTH 2001](#) or [MTH 2051](#) or [MTH 2201](#) or [MTH 2202](#) or [MTH 2332](#) or [MTH 2401](#).

---

[COM 1101 Composition and Rhetoric](#)

[MTH 1701 College Algebra](#)

(15 Credit Hours)

plete:

[BUS 1502 Foundations in Creativity, Innovation, and Entrepreneurship](#)

---

## MTH 2001 Calculus 3

Credit Hours: 4

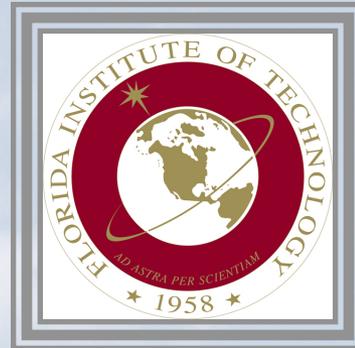
Cylindrical and spherical coordinates, vectors, functions of several variables, partial derivatives and extrema, multiple integral, vector integral calculus.

Prerequisite: [MTH 1002](#)

[Close](#)

# Advanced Search

- Find what you need by using the Advanced Search function, giving you the ability to find anything, anywhere in the catalog system.



2015-2016 Catalog

Catalog Search ★ ?

**Search Options**

Choose search locations to narrow or expand your search.

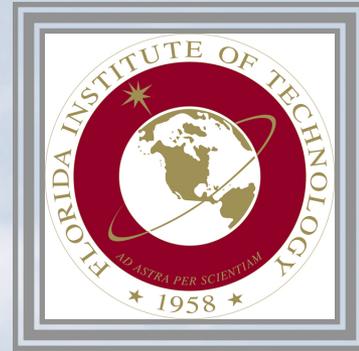
Enter a keyword or phrase.

Find whole word or phrase only.

Search Locations

- Courses [[Show prefix list.](#)]
- Programs
- Hierarchy Items
- Other Content

★ ?



## Frequently Asked Questions

1. Do I need to log into the catalog system with my Tracks information?  
*No. There is no login to view the catalog, but if you want to use the My Personal Catalog and save your selections, you will be prompted to create an account in the system.*
2. How do I find out if prerequisites are required for a course? *You can click on any live course to open its full description, including any prerequisites, corequisites or other restrictions to registration.*
3. Where can I find the major code? *The top of the degree program has useful information, including admission requirements, locations where the program is offered and the major code.*