

Department and Professional Orientation

EML2920 Section 12101

Class Period: T 5th period, 11:45-12:35p

Locations: Online by Zoom

Academic Term: Fall-2025

Instructor:

Name: Mike Griffis

Email Address: mwg@ufl.edu

Office: NEB-137, 352-392-9473

Cell: 352-317-4045

Office Hours: M/W: 3 to 5p, in person or Zoom (other times on arrangement).

Zoom Link: See below.

Teaching Assistant/Peer Mentor/Supervised Teaching Student:

Please contact through the Canvas website

Course Description

Principles of mechanical and aerospace engineering practice, professional standards, engineering ethics. (1 Credit)

Course Pre-Requisites / Co-Requisites

Pre-Req: None

Course Objectives

The purpose of the course is to provide students with exposure to wide-ranging aspects of mechanical and aerospace engineering, including:

- Breadth of MAE subdisciplines
- Diversity of MAE engineers and endeavors
- Career paths, including graduate school
- Excitement, relevance, and societal impact of MAE
- Ethical practices and regulatory affairs
- Professional resources, e.g. recent graduates and professional societies
- Peer-reviewed research
- Intellectual property

To accomplish these broad objectives, specific knowledge and skills will be built through discussions, assignments on the grand challenges in engineering: Food and Water, Security, Healthcare, and Energy and the Environment.

Relation to Program Outcomes (ABET):

Outcome	Coverage*
1. An ability to identify, formulate, and solve complex engineering problems by applying principles of engineering, science, and mathematics	Low
2. An ability to apply engineering design to produce solutions that meet specified needs with consideration of public health, safety, and welfare, as well as global, cultural, social, environmental, and economic factors	
3. An ability to communicate effectively with a range of audiences	Medium
4. An ability to recognize ethical and professional responsibilities in engineering situations and make informed judgments, which must consider the impact of engineering solutions in global, economic, environmental, and societal contexts	High
5. An ability to function effectively on a team whose members together provide leadership, create a collaborative and inclusive environment, establish goals, plan tasks, and meet objectives	Medium
6. An ability to develop and conduct appropriate experimentation, analyze and interpret data, and use engineering judgment to draw conclusions	

7. An ability to acquire and apply new knowledge as needed, using appropriate learning strategies	Medium
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*Coverage is given as high, medium, or low. An empty box indicates that this outcome is not covered or assessed in the course.

Required Textbooks and Software

None

Required Computer

Recommended Computer Specifications:

<https://it.ufl.edu/get-help/student-computer-recommendations/>

HWCOE Computer Requirements:

<https://www.eng.ufl.edu/students/advising/fall-semester-checklist/computer-requirements/>

Course Schedule

Meet each Tuesday starting Aug 26th to Dec 2nd by Zoom. Generally, guest lecturers will present. Then, there will be an open Q/A session. The lecture period will conclude with a group-based breakout session.

Zoom Links:

Lecture: <https://ufl.zoom.us/j/95768584179?pwd=T7pVKPCab95BQgGgsyvvuvrCAAScaR.1>

Office Hour: <https://ufl.zoom.us/j/99948407020?pwd=ZPYEbPHleVfB5sOHwxrpLEx19Mc4av.1>

Evaluation of Grades

Assignment	Total Points
Individual Work -Attendance -Canvas Quizzes, Individual assignments -Zoom Polls	50%
Group, Project Work	50%
Total:	100%

Note: *Group Project Grade subject to adjustment (+/-) based on peer evaluations.

Note: No Final Exam

Grading Policy

The following is given as an example only.

Percent	Grade	Grade Points
93.4 - 100	A	4.00
90.0 - 93.3	A-	3.67
86.7 - 89.9	B+	3.33
83.4 - 86.6	B	3.00
80.0 - 83.3	B-	2.67
76.7 - 79.9	C+	2.33
73.4 - 76.6	C	2.00
70.0 - 73.3	C-	1.67
66.7 - 69.9	D+	1.33
63.4 - 66.6	D	1.00
60.0 - 63.3	D-	0.67
0 - 59.9	E	0.00

Attendance Policy, Class Expectations, and Make-Up Policy

The objective is to provide a live Zoom class. Attendance is required and recorded by logging in through the Zoom lecture link. You must log in with your gator link id. You must use a computer (not cell phone). Consistent with UF

policy, required attendance starts Aug 26th. There will be at least one extra, bonus meeting for students to make up for missed classes. The lecture periods are not recorded. You are responsible for participating, staying up-to-date on all announcements, in-class lectures, individual assignments, homework, and group assignments.

Canvas quizzes are found in Canvas under “Quizzes” and these are usually time sensitive. Zoom polls occur during meeting while in Zoom. Course notes will not always be supplied on the Canvas webpage. Late homework is not generally accepted. Late group project submission is not generally accepted. Makeups are only allowed for students with extreme, documented circumstances. Students must contact the instructor as soon as possible to provide documentation and request a make-up. Note: club sport activities are not excused absences, personal vacations are not excused absences, job interviews are not excused absences.

Group participation is required for some assignments. Individual grades for group project assignments are subject to change (+/-) based on peer evaluations and instructor observations.

Academic Policies & Resources

To support consistent and accessible communication of university-wide student resources, instructors must include this link to academic policies and campus resources: <https://go.ufl.edu/syllabuspolices>. Instructor-specific guidelines for courses must accommodate these policies.

Commitment to a Positive Learning Environment

The Herbert Wertheim College of Engineering values varied perspectives and lived experiences within our community and is committed to supporting the University’s core values.

If you feel like your performance in class is being impacted, please contact your instructor or any of the following:

- Your academic advisor or Undergraduate Coordinator
- HWC OE Human Resources, 352-392-0904, student-support-hr@eng.ufl.edu
- Pam Dickrell, Associate Dean of Student Affairs, 352-392-2177, pld@ufl.edu