Course Syllabus for

MECH 1208 – Introduction to Mechanical Engineering II

Day	Section	Time	Instructor(s)	Room	TA/Grader
Tuesday	304	10:00 am – 11:40 am	Dr. Rios	ECSW 1.130	TBD
Tuesday	302	1:00 pm – 2:40 pm	Dr. Rios	ECSW 1.130	TBD
Wednesday	301	10:00 am – 11:40 am	Dr. Fadda	ECSW 1.130	TBD
Wednesday	305	1:00 pm – 2:40 pm	Dr. Fadda	ECSW 1.130	TBD
Thursday	303	10:00 am – 11:40 am	Dr. Rios	ECSW 1.130	TBD
Friday	001	10:00 am – 10:50 am	Dr. Rios, Dr. Fadda	HH 2.402	TBD

Course Description

The purpose of this course is to give students a general understanding of the broad range of technical areas and applications specific to the mechanical engineering profession. Course activities include team-oriented competitions, and lectures by mechanical engineering experts.

Course Learning Outcomes (CLOs)

Upon successful completion of this course, you will be able to:

a) Explain concepts in mechanical design, forces and stresses, engineering materials, motion and power transmission, and thermal and energy systems.
b) Develop problem-solving and communications skills.
c) Function as a team on group projects.
d) Explain how continued education and knowledge of contemporary issues is important for the long-term effective practice of engineering.

Course Pre-requisites, Co-requisites, and/or Other Restrictions

Pre-requisite(s)*:* MECH 1100 or equivalent
Co-requisite: PHYS 2325/2125 and MATH 2419 or MATH 2414
Other Restrictions*:* None

Professor Contact Information

Dr. Oziel Rios
Office: ECSW 2.150 D
Office Hours: Tuesday and Thursday 11:50am-12:50pm
Phone: (972) 883-4690
Email: oziel.rios@utdallas.edu

Dr. Dani Fadda
Office: ECSW 2.150 C
Office Hours: Monday and Wednesday 9:00am-9:50am
Phone: 972-883-4626
Email: fadda@utdallas.edu

When sending an email, include your class and lab section number in the subject line (example, MECH 1208.301).

Grades will only be discussed in person during the office hours. Please contact or attend office hours of the instructor of record for your lab section (see table above). You are responsible to schedule an appointment that is convenient for you and your instructor if you have a conflict and cannot attend office hours.

Teaching Assistant Contact Information

Name	Email	Office Hours
TBD	TBD	TBD
TBD	TBD	TBD
TBD	TBD	TBD
TBD	TBD	TBD

TAs and graders will have office hours at the times indicated above in the Mechanical Engineering Freshman Studio. You are responsible to schedule an appointment that is convenient for you and your TA if you have a conflict and cannot attend office hours.

You are welcome to attend office hours with any TA. However, if you have questions regarding your grades, only discuss grades in person with the TA assigned to your lab section (see table above).

When sending an email, include your class and lab section number in the subject line (example MECH 1208.301).

Course Materials

1) Notes, supporting materials, and other resources will be posted on eLearning.

2) This course requires the use of a classroom polling software known as **Turning Point** in every lecture and every lab in order to participate in the class and receive attendance credit.
   - If you use a smartphone/tablet/laptop, you can purchase a **Turning License** (available at the UTD Bookstore) and access it with your device. You must bring your smartphone/tablet/laptop and access Turning Point during every lecture and every lab.
   - If you do not use a smartphone/tablet/laptop or do not have access to one for all lectures and labs, you can purchase a **Turning Technologies RF-LCD Response Card** (also known as a clicker) in addition to the Turning License. The clicker is also available at the UTD Bookstore.
   - You will not receive attendance or participation credit in any lab or class unless you participate using Turning Point.
   - The Turning License is associated with the student who purchased it. The license cannot be used by multiple students during a given semester.
   - Please visit https://ets.utdallas.edu/elearning/resources/turning-point-students for more details.
   - **You have until Week 3 of semester to fix any issues with Turning Point. Any unresolved issues after Week 3 will affect your participation/attendance grades.**

3) All software used to complete activities in this course (except Turning Point) will be available on the computers in the Freshman Studio.

4) Suggested (not required) Text Book:
   - An Introduction to Mechanical Engineering (4^{th} Ed.), Jonathan Wickert and Kemper Lewis, ISBN-13: 978-1305635135

Important Dates

Classes begin on 1/14/2019
Classes end on 5/3/2019
MLK is on 1/21/2019
Spring Break is from 3/18/2019 to 3/22/2019

Course Structure and Schedule

The following is a schedule of class topics. The subjects and dates are subject to change. It is your responsibility to keep up with changes announced in the class or lab. For each week, the Lab column corresponds to that week's lab session where you must attend the section in which you are registered. The Lecture column corresponds to the Friday lecture session where all sections are combined.

Week	Lab	Lecture
1	Lab 1, January 14–18, 2019 No lab during week 1	Lecture 1, January 18, 2019 Course overview; Solid Modeling in SolidWorks
2	Lab 2, January 21–25, 2019 CAD -- Part Modeling (Session 1)	Lecture 2, January 25, 2019 Assembly Modeling in SolidWorks
3	Lab 3, January 28 – February 1, 2019 CAD -- Assembly Modeling (Session 2)	Lecture 3, February 1, 2019 Motion and Power Transmission
4	Lab 4, February 4–8, 2019 Machine Components Activity (Session 1)	Lecture 4, February 8, 2019 TBD
5	Lab 5, February 11–15, 2019 Machine Components Activity (Session 2)	Lecture 5, February 15, 2019 Matlab Review
6	Lab 6, February 18–22, 2019 Machine Components Activity (Session 3)	Lecture 6, February 22, 2019 Forces on Structures (Part 1)
7	Lab 7 and Lecture 7 are cancelled this week. Take Exam 1 at the **Testing Center**. The exam covers Labs 1 to 6 and Lectures 1 to 5. Reserve a seat using: http://www.utdallas.edu/studentsuccess/testing-center/	
8	Lab 8, March 4–8, 2019 Structures Activity (Session 1)	Lecture 8, March 8, 2019 Forces on Structures (Part 2)
9	Lab 9, March 11–15, 2019 Structures Activity (Session 2)	Lecture 9, March 15, 2019 TBD
10	Lab 10 and Lecture 10 are cancelled this week. Fall Break/Thanksgiving Holiday	
11	Lab 11, March 25–29, 2019 Structures Activity (Session 3)	Lecture 11, March 29, 2019 Thermal Energy and Fluid Systems (Part 1)
12	Lab 12, April 1–5, 2019 Thermal Activity (Session 1)	Lecture 12, April 5, 2019 Thermal Energy and Fluid Systems (Part 2)
13	Lab 13, April 8-12, 2019 Thermal Activity (Session 2)	Lecture 13, April 12, 2019 Mechanical Design [online video]
14	Lab 14, April 15-19, 2019 CAD Design Project (Session 1)	Lecture 14, April 19, 2019 TBD
15	Lab 15, April 22–26, 2019 CAD Design Project (Session 2)	Lecture 15, April 26, 2019 TA-led review for exam 2
16	Lab 16 and Lecture 16 are cancelled this week. Take Exam 2 at the **Testing Center**. The exam covers Labs 8 to 15 and Lectures 6 to 15. Reserve a seat using: http://www.utdallas.edu/studentsuccess/testing-center/	

Notes: TBD dates are reserved for invited speakers or another activity specified by the instructors.
A TA-led review for exam 1 will be scheduled on Week 6 during the TA office hours.

Grading Policy

[**10%**] **Attendance and Class Participation**:

- You are required to attend and participate in all lecture and lab sessions. To participate in the lecture or lab, you must bring your smartphone/tablet/laptop or clicker to all lectures and labs and you must have an active Turning License (see "Course Materials").
- Answering the Turning Point questions correctly is worth 10%.
- A grade of F in MECH 1208 will be automatically given for no participation using Turning Point in 9 sessions. A session can be a lecture or a lab.

[**40%**] **Exams**:

- There will be two exams each worth 20%.
- Exams will be administered by the testing center. Students must reserve a seat at least 72 hours in advance using the following website (click the Reserve Your Seat button on the right-hand side and follow the instructions): https://ets.utdallas.edu/testing-center/ .
- Make-up exams will only be allowed for the case of illness, attendance of a university sponsored event (such as an athletic activity) or under unusual circumstances. For each case, you are required to provide proper documentation (such as doctor's note or a note from your athletic advisor).
- Materials such as books, notes, electronic devices and backpacks must be placed in the locker provided at the testing center before entering the exam room.
- Scientific calculators are allowed so long as they are not capable of wireless communication.

[**50%**] **In-Class Activities**:

- Homework assignments and deliverables for in-class activities will be submitted in eLearning.
- A grade of zero will be given for in-class-activities in case your presence is not documented using participation through Turning Point.
- ***No late homework assignments or in-class activities will be accepted without proper documentation - no exceptions***.

You have five business days to appeal any grade. The five days are counted starting from the day the grade posted in eLearning. You can appeal the grade by visiting the instructor or TA during office hours.

You have five business days to provide an excuse (such as doctor's note or note from athletic advisor) for your absence from a lecture or a lab. The five days are counted starting from the day of your absence.

Your final letter grade will be assigned based on exceeding the following thresholds:

	Plus (+)		Minus (-)
A	97	93	90
B	87	83	80
C	77	73	70
D	67	63	60
F	Below 60		

Course & University Policies

Email Policy

- Email must be sent from your UTD email account to the UTD email address of your instructor or TA.
- Please allow 24-36 hours for a response during workdays.
- Please format your emails professionally before sending: (i) address the recipient appropriately (e.g., “Prof. Rios”, “Dr. Rios”, or “Dear Dr. Rios”), (ii) use correct grammar, capitalization, and sentence structure, and (iii) add sufficient closing (e.g., “Best regards” followed by your name and phone number).
- Include the course number and section number in the subject line of your email.

Throughout the semester, the instructor will have intermittent, unavoidable professional travel commitments. On these days, the instructor will provide advance notice and class will be canceled or taught by a TA.

Academic Integrity: The faculty expects from students a high level of responsibility and academic honesty. Because the value of an academic degree depends upon the absolute integrity of the work done by the student for that degree, it is imperative that a student demonstrates a high standard of individual honor in his or her scholastic work.

Academic Dishonesty*:* Academic dishonesty can occur in relation to any type of work submitted for academic credit or as a requirement for a class. It can include individual work or a group project. Academic dishonesty includes plagiarism, cheating, fabrication, and collaboration/collusion. In order to avoid academic dishonesty, it is important for students to fully understand the expectations of their professors. This is best accomplished through asking clarifying questions if an individual does not completely understand the requirements of an assignment.

Academic dishonesty will not be tolerated. All suspected cases of academic dishonesty will be sent to the Office of Judicial Affairs (see http://www.utdallas.edu/deanofstudents/managing/). If it is determined that academic dishonesty occurred you will receive a grade of **F** in this course.

Sharing Confidential Information: Students considering sharing personal information in email, in person, or within assignments or exams should be aware that faculty members and teaching/research assistants are required by UT Dallas policy to report information about sexual misconduct to the UT Dallas Title IX Coordinator. Per university policy, faculty have been informed that they must identify the student to the UT Dallas Title IX Coordinator. Students who wish to have confidential discussions of incidents related to sexual harassment or sexual misconduct should contact the Student Counseling Center (972-883-2527 or after hours 972-UTD-TALK or 972-883-8255), the Women's Center (972-883-8255), a health care provider in the Student Health Center (972-883-2747), the clergyperson (or other legally recognized religious advisor) of their choice, or an off-campus resource (i.e., rape crisis center, doctor, psychologist). Students who are sexually assaulted, harassed, or victims of sexual misconduct, domestic violence, or stalking, are encouraged to directly report these incidents to the UT Dallas

Police Department at 972-883-2222 or to the Title IX Coordinator at 972-883-2218. Additional information and resources may be found at http://www.utdallas.edu/oiec/title-ix/resources.

Technical Support: If you experience any issues with your UT Dallas account, contact the UT Dallas Office of Information Technology Help Desk: assist@utdallas.edu or call 972-883-2911 UT Dallas provides eLearning technical support 24 hours a day/7 days a week. The services include a toll free telephone number for immediate assistance (1-866-588-3192), email request service, and an online chat service. Please use this link to access the UTD eLearning Helpdesk: http://www.utdallas.edu/elearning/eLearningHelpdesk.html.

Student Conduct and Discipline: The University of Texas System (Regents' Rule 50101) and The University of Texas at Dallas have rules and regulations for the orderly and efficient conduct of their business. It is the responsibility of each student and each student organization to be knowledgeable about the rules and regulations, which govern student conduct and activities. General information on student conduct and discipline is contained in the UT Dallas online catalogs (http://catalog.utdallas.edu).

For a full list of university policies, please visit http://go.utdallas.edu/syllabus-policies.

THE INFORMATION IN THIS DOCUMENT IS SUBJECT TO CHANGE AT THE DISCRETION OF THE INSTRUCTOR.