

Deformable Bodies

Last Updated: Wed, 11/19/2025

Course prefix: COE

Course number: 3001

Section: K

CRN (you may add up to five):

26709

Instructor First Name: Yuhang

Instructor Last Name: Hu

Semester: Spring

Academic year: 2026

Course description:

COE 3001 is an undergraduate course on the mechanics of deformable solids. The primary goal of the course is to provide students with the beginnings of the understanding and skills required to analyze stress, strain, stress-strain relations, deflections, and failure in deformable solids. While analytical treatments are emphasized in this first course, it serves as a necessary launching point for further advanced courses.

Course learning outcomes:

Be able to analyze stress, strain, stress-strain relations for deformable bodies in axial loading, torsion, bending, bending with shear conditions.

Required course materials:

Text Book: Mechanics of Materials, by James M. Gere & Barry J. Goodno, 9th Ed, Cengage Learning. (*required*)

Grading policy:

Homework: 20%

Participation: 5%

Exam I: 15% (75 min, in lecture time)

Exam II: 15% (75 min, in lecture time)

Exam III: 15% (75 min, in lecture time)

Final exam: 30% (170 min, in exam week)

Attendance policy:

1. Attendance will be checked during almost all class days through TurningPoint.
2. 2 of the checked attendance will be waived. These waivers are designed for giving you an excuse for unforeseen conditions that may impact your class attendance.
3. Because of item 2, no other excuses will be taken.
4. The documented and justified excused absence will not be counted as absence and will not be counted toward to the raincheck in item 2.

Academic honesty/integrity statement:

Georgia Tech aims to cultivate a community based on trust, academic integrity, and honor. Students are expected to act according to the highest ethical standards. For information on Georgia Tech's Academic Honor Code, please visit:

<http://www.policylibrary.gatech.edu/student-affairs/academic-honor-code>
Links to an external site. Students in this class are expected to always abide by the Academic Honor Code. All work turned in for grading must be original and students are not allowed to use any resources other than those explicitly authorized for each assignment. Students will be asked to acknowledge their acceptance of these stipulations and their willingness to abide by all terms of the Honor Code by signing an "Honor Agreement" attached to each exam.

All violations of the Honor Code (without exception) will be reported to the Office of Student Integrity with the following recommended sanctions:

- First-time offenders (in this course): lowering the course letter grade by one full letter grade at the conclusion of the course;
- Repeat offenders: course letter grade "F" (failure of the course).