

Syllabus
MAE 2314 - Fluid Mechanics I
(Required course by ME program)

1. **Instructor:** Zhen X. Han
2. **Email Address:** han@uta.edu
3. **Office Phone No.:** 817-272-7376
4. **Office Location:** 204B, Woolf Hall
5. **Office Hours:** W/F 10:00am - 11:30pm
6. **Meeting Days&Times:** M/W/F 9:00am - 9:50am
7. **Meeting Location:** 208 Woolf Hall
8. **Course Website:** webct.uta.edu
9. **Course Prerequisites:** MAE 2323 (Dynamics), MAE3310 (Thermodynamics I) or concurrent enrollment and MAE3360 (Engineering Analysis)
10. **Required Readings/Materials:** Text book: Fundamentals of Fluid Mechanics, 6th Edition. ISBN: 978-0-470-26284-9
11. **Course Contents:** Fluid properties; fluid statics; Bernoulli's equation; fluid kinematics; finite control volume analysis of fluid flow; dimensional analysis and similitude; viscous flow in pipes.
12. **Course Learning Goals/Objectives:**
 - To study fundamental concepts of fluid statics, kinematics and dynamics.
 - To develop skills and techniques essential in analyzing and solving engineering problems involving fluid flow.
13. **Attendance:** Attendance required
14. **Drop Policy:** Refer to UTA course drop policy.
15. **Specific Course Requirements**

(a) **Quizzes:**

- At least 6 in-class pop-quizzes
- A maximum of 3 % bonus grade points will be rewarded

(b) **Homework:**

- Assigned during lectures and due at the beginning of the following Monday's class
- Each homework problem will be graded out of 10 points
- No late homework is accepted
- Must follow *Required Homework Solution Format* (See Handout #1)

(c) **Exams:**

- 2 midterms and 1 final (3 exams total)
- Closed books/Closed notes
- An equation sheet will be provided
- No graphing/programmable calculators
- Comprehensive final exam
- No make-up work

(d) **Grading Format:**

- Homework: 10%
- Exams: 30% each (90% total)

16. **Other Information:**

- **Final Review Week** A period of five class days prior to the first day of final examinations will be designated as FINAL REVIEW WEEK. The purpose of this week is to allow UT Arlington students sufficient time to prepare for final exams. During this week, there will be no schedule or required activities such as field trips, seminars, or performances; and no instructor shall assign any themes, research problems or exercises of similar scope that have a completion date during or following this week unless specified in the class syllabus. During Final Review Week, an instructor will not give any exams constituting 10 % or more of the final grade, except make-up tests and laboratory examinations. In addition, no instructor will give any portion of the final exam during Final Review Week.

- **Americans With Disabilities Act**

The University of Texas at Arlington is on record as being committed to both the spirit and letter of federal equal opportunity legislation; reference Public Law 93112 – The Rehabilitation Act of 1973 as amended. With the passage of new federal legislation entitled Americans With Disabilities Act - (ADA), pursuant to section 504 of The Rehabilitation Act, there is renewed focus on providing this population with the same opportunities enjoyed by all citizens.

As a faculty member, I am required by law to provide "reasonable accommodation" to students with disabilities, so as not to discriminate on the basis of that disability. Student responsibility primarily rests with informing faculty at the beginning of the semester and in providing authorized documentation through designated administrative channels.

- **Academic Dishonesty**

It is the philosophy of The University of Texas at Arlington that academic dishonesty is a completely unacceptable mode of conduct and will not be tolerated in any form. All persons involved in academic dishonesty will be disciplined in accordance with University regulations and procedures. Discipline may include suspension or expulsion from the University.

"Scholastic dishonesty includes but is not limited to cheating, plagiarism, collusion, the submission for credit of any work or materials that are attributable in whole or in part to another person, taking an examination for another person, any act designed to give unfair advantage to a student or the attempt to commit such acts." (Regents' Rules and Regulations, Part One, Chapter VI, Section 3, Subsection 3.2, Subdivision 3.22)

- **Student Support Services Available**

The University of Texas at Arlington supports a variety of student success programs to help you connect with the University and achieve academic success. These programs include learning assistance, developmental education, advising and mentoring, admission and transition, and federally funded programs. Students requiring assistance academically, personally, or socially should contact the Office of Student Success Programs at 817-272-6107 for more information and appropriate referrals.

For assistance with your library needs in this course, please consult the appropriate subject librarian.