

Homework Information and Format

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Homework Philosophy

One of the best ways to learn something is through practice and repetition. Therefore, homework assignments are extremely important in this class! Homework sets are carefully designed to be workable, yet challenging. All homework assignments are *comprehensive*. If you study and understand the homework, you should not have to struggle with the exams.

Homework Policy

The due date for each homework assignment is clearly indicated on the course website. Homework turned in late will receive partial credit, according to the following rules:

- 10% off if turned in late, but before 5:00 p.m. on the due date.
- 25% off if turned in late, but before 5:00 p.m. on the first school day after the due date.
- 50% off if turned in late, but before 5:00 p.m. on the second school day after the due date.
- No credit if turned in after two school days beyond the due date.

Exceptions will be made under certain circumstances (illness with a doctor's note, death in the family, etc.). The instructor's solutions will be made available within a week after the due date (typically immediately after the 50%-off turn-in date).

Students may work together on the homework assignments in study groups (to help each other), provided that *each person in the group is contributing to each solution*. If students choose to work in a group, each student must still submit a complete homework solution for each problem. Note that homework counts for a considerable portion of your final course grade, so it is critical that you understand how to solve the homework problems.

Homework Format

For ease of grading, and for consistency, each homework set *must* be submitted in the following format:

1. Print out the homework assignment from the web page, and staple it to the completed homework. This page (or pages) will serve as the cover page(s) for the assignment.
2. Write your name in the appropriate place on the cover page.
3. Use only 8-1/2 x 11" paper.
4. Do not rip out paper from a spiral notebook unless you cut off all the messy fringes and frays.
5. Staple all pages together in upper left corner (no folders please).
6. One problem per page is preferred, but short problems can be combined on one page. If so, draw a **dark line** between problems to separate them.

Problem Format

For ease of grading, and for consistency, each problem *must* be submitted in the following format:

1. Write down the problem number and encircle it.
2. Include these three parts for each problem:
 - **Given:** Summarize the problem at hand, including any relevant sketches, dimensions, and given information.
 - **To do:** State briefly what is *unknown*; i.e. what is the goal of the problem?
 - **Solution:** Present a step-by-step solution of the problem. **Show all of your work!** Explain your assumptions, and indicate where equations come from (e.g., "...From the definition of volume flow rate, Eq. (2.24), it is seen that ..."). As you go along, include equation numbers so the grader can follow your work. Always include units (if appropriate) in any calculations, and put a box around the final answer. Never give an answer with more significant digits than the minimum number of significant digits provided in the problem statement. If the number of significant digits is not clear from the problem statement, give your answer to three significant digits. (Only rarely are more than three significant digits relevant in engineering analyses.)
3. Set your final answer(s) inside a box at the right edge of the page so that they can be clearly seen by the grader.