Required Homework Format

At the top of the first page of your homework, please include:

Name Date Homework Assignment #

For each of the homework problems, you must include the following:

Problem

<u>Problem Statement</u>: State briefly in your own words everything that is known. A list of known or given values is appropriate.

Find: State concisely what is to be determined.

Schematic: Draw a neat sketch of the system. Include the control volume boundary, if appropriate. Label the drawing with relevant information from the problem statement. When appropriate, include a coordinate system. Arrows and vectors depend on a coordinate system and your sign convention.

Assumptions: List any important simplifying assumptions. Some equations are derived or developed based on specific assumptions. If you use such equations to solve a homework problem, you should list the underlying assumptions.

<u>Analysis:</u> Begin with the appropriate governing equations and show—in neat and logical order—the steps to the final solution. It is advisable to work with the equations as long as possible before substituting in numerical values. If property data are required, identify the table(s) from which you obtained the data. Finally, substitute numerical values into the equations. You must include the correct units. Carefully check that the units for all terms are consistent.

Answer: All answers MUST be clearly marked with a box, and they MUST include the correct units.

<u>Comments</u>: When appropriate, briefly discuss your results.