After reading Sections 1.1 and 1.2, you should know the definitions of the following terms, as well as, be able to give examples. You should also be able to compare and contrast related terms. Finally, do the algebraic aerobics problems. These will yield practice of the basic skills and concepts necessary for the homework problems.

- **Section 1.1 terms**
  - quantitative vs. categorical variables
  - data
  - bar charts
  - histograms
  - pie charts
  - frequency vs relative frequency
  - mean
  - median

- **Section 1.1 questions**
  - How can categorical data be visualized?
  - How is a bar (pie) chart organized?
  - How is a histogram organized?
  - what is the basic difference between a bar chart and a histogram?
  - In what ways are a bar chart and a pie chart similar? different?
– What is the difference between frequency and relative frequency? How are they similar when used in a bar chart?
– What is necessary to know in order to find the relative frequency of a particular category data set?
– What are the three important elements of a bar (pie) chart?
– Do the mean and the median of a data set necessarily the same? Be able to give examples to illustrate your answer.

• Section 1.1 Homework: # 2, in addition, construct a pie chart which illustrates the population of these 5 countries as a part of the worlds population in 2003. #5, 10, 15, 18, 28.

• Section 1.2 terms
  – data table
  – times series
  – graph
  – quantitative analysis
  – equation
  – solutions to an equation
  – graph of an equation
  – mathematical model

• Section 1.2 questions
  – What is a two variable data set and what does it tell you?
– What are the three important elements of a graph?
– What are some important items to consider when constructing a ”60-second summary”?
– How are mathematical models used? Are they always accurate? Do they need to be completely accurate?
– The text discusses three ways of presenting the relationship between two variables, what are they?

• Section 1.2 Homework: #31, 36, 39, 42-45, 48.