Solve the following problems. Be sure to show your work in a neat and orderly fashion to receive credit.

1) In 2004, sales in the athletic footwear market in the United States were $4.7 billion.
   a) There was a 5% increase in the athletic footwear sales from 2004 to 2006. Find the total sales for
      the athletic footwear market in 2006. (Round to the nearest tenth of a billion.) (3 pts.)
   b) Twenty-five percent of the sales of footwear were running shoes. Find the amount of money spent on running
      shoes in 2006. (Round to the nearest hundredth of a billion.) (1 pt.)

2) A new fax machine was recently purchased for an office for $464.40 including tax. If the tax rate is 9%, find the
   price of the fax machine before tax. (3 pts.)

3) A man has $34,000 to invest. He invests some at 5% and the balance at 4%. His total annual interest income is
   $1545. Find the amount he invests at each rate. (3 pts.)

4) How many liters of a 14% alcohol solution must be mixed with 20 L of a 50% solution to get a 30% solution? (3 pts.)