

(A) Define the variable and the information given. (B) Write a proportion that represents the situation. (C) Solve the proportion. (D) State the answer with the proper units. (E) Check. (Please label work with the letter of the direction.)

1) Of those children adopted in the U.S., 6.5% were over 10 years old. If 8400 were adopted, how many were over 10 years old? [4-4]

3) A house was reduced from \$104,000 to \$96,000. What was the percent of decrease? (Round to the nearest whole percent.) [4-5]

2) Alexis's homecoming dress cost \$116.00. If the sales tax was 7%, how much did Alexis spend? [4-5]

4) An architectural firm makes a model of a science center they are building. The ratio of the model to actual size is 1 to 80. What is the height of the model if the actual building is 60 feet high? [4-1]

5) The time it takes Ajax Cleaning Company to clean an office building each night varies inversely with the number of employees who report for work. If 6 employees can clean the building in 8 hours, how many employees would be need to complete the job in 6 hours? [4-8]