1. **Heights of Male Students** Heights of people of the same sex and similar ages are approximately Normally distributed. You know from government data that the mean height of young men is 70 inches with a standard deviation of 2.8 inches.  
   1. What is the numerical variable of interest here?
   2. What is the chance that an individual male student selected at random is shorter than 68 inches?
   3. Suppose that a random sample of 10 male students is taken. What Normal distribution could be used to describing the sampling distribution of the sample mean heights?
   4. What is the chance that in a random sample of 10 male students the mean height is less than 68 inches?
2. **Home Values** Assessment records indicate that the value of homes in a small city is skewed right, with a mean of $140,000 and standard deviation of $60,000.  
   1. Could we use the Normal distribution to find the probability that a single home selected at random would be assessed at more than $165,000? Briefly explain.
   2. To check the accuracy of the assessment data, city officials plan to conduct a detailed assessment of 100 homes selected at random. What is the chance that the 100 randomly selected homes have a mean value of more than $165,000?