Moore SCC 8e

Chapter 13 Practice Quiz

1. The total area under a density curve is:

a. 1

b. 100

c. Dependent upon the data set

d. None of the choices are correct.

2. The mean of a density curve is:

a. The point that divides the area under the curve in half

b. The balance point or center of gravity

c. Both the point that divides the area under the curve in half and the balance point or center of gravity

d. None of the choices are correct.

3. The median of a density curve is:

a. The point that divides the area under the curve in half

b. The balance point or center of gravity

c. Both the point that divides the area under the curve in half and the balance point or center of gravity

d. None of the choices are correct.

4. Which of the following are properties of Normal curves?

a. They can be described by giving their mean and standard deviation.

b. The mean is at the center of symmetry of the curve.

c. They describe the distribution of statistics like sample proportions and sample means.

d. All of the choices are correct.

e. None of the choices are correct.

5. What percent of observations are between the mean and two standard deviations above the mean in a Normal distribution?

a. 47.5%

b. 68%

c. 95%

d. 99.7%

6. A local sub shop lists the carbohydrate content in each of its “healthy choice sandwiches.” The distribution of carbohydrate content is approximately Normal with mean 40 carbohydrates and a standard deviation of 2 carbohydrates.

Between which carbohydrate amounts do the middle 68% of sandwiches fall?

a. 38 and 40 carbohydrates

b. 38 and 42 carbohydrates

c. 40 and 42 carbohydrates

d. 36 and 44 carbohydrates

7. A local sub shop lists the carbohydrate content in each of its “healthy choice sandwiches.” The distribution of carbohydrate content is approximately Normal with mean 40 carbohydrates and a standard deviation of 2 carbohydrates.

What percentage of healthy choice sandwiches are less than 38 grams of carbohydrates?

a. 13.5%

b. 16%

c. 27%

d. 36%

e. 50%

8. Standard scores are used to:

a. Express observations in terms of the number of standard deviations above or below the mean

b. Compare values of different distributions

c. Compare roughly symmetrical distributions with different means and standard deviations

d. All of the choices are correct.

e. None of the choices are correct.

9. Scores on the Math or Verbal part of the SAT test are Normally distributed with a mean score of 500 and a standard deviation of 100.

If a person scores 700 on the Math part of the SAT, what is his standard score?

a. 1 standard deviation above the mean

b. 2 standard deviations above the mean

c. .5 standard deviations above the mean

d. 0.25 standard deviations above the mean

10. Scores on the Math or Verbal part of the SAT test are Normally distributed with a mean score of 500 and a standard deviation of 100.

How high must a student score on the Math SAT to fall within the top 15% of all scores?

a. 550

b. 600

c. 650

d. 700