Statistics Quiz

1. The mean of five numbers is 27. If one number is excluded, the mean becomes 25. What is the excluded number?
   A. 35
   B. 27
   C. 37
   D. 30

2. If the median of the data: 4, 8, 9, x, 11, 13, 17 is 10, then the value of x is:
   A. 10
   B. 12
   C. 9
   D. 11

3. The mode of the data: 3, 6, 9, 6, 15, 6, 3 is:
   A. 3
   B. 6
   C. 9
   D. 15

4. For a certain frequency distribution, the value of mean is greater than the median. The distribution is:
   A. Positively skewed
   B. Negatively skewed
   C. Symmetric
   D. Bimodal

5. The mean of 100 observations was found to be 40. Later on, it was discovered that one observation was misread as 83 instead of 53. The correct mean is:
   A. 39.7
   B. 40.3
   C. 40
   D. 39.3

6. If the mean of the data: 4, x, 9, 11, 15 is 10, then the value of x is:
   A. 11
   B. 10
   C. 9
   D. 12

7. The range of the data: 5, 12, 18, 23, 45, 7, 10 is:
   A. 40
   B. 38
   C. 45
   D. 20

8. What is the class size of the following frequency distribution?

Class Interval	Frequency
0-10	5
10-20	10
20-30	15
30-40	20

   A. 10
   B. 15
   C. 20
   D. 5

9. If the mean of n observations is m, then the sum of all the observations is:
   A. m
   B. mn
   C. $m+n$
   D. m/n

10. The median of the data: 3, 5, 7, 12, 13, 14, 18, 21, 23 is:
   A. 13
   B. 14
   C. 12
   D. 18

11. A pie chart is a circular chart divided into sectors that each represent a proportion of the whole. What does each sector's central angle correspond to?
   A. The mean value of the data
   B. The frequency of the data
   C. The range of the data
   D. The cumulative frequency

12. The cumulative frequency is used to determine:
   A. The mean
   B. The median
   C. The mode
   D. The standard deviation

13. The 'less than' type ogive and the 'more than' type ogive intersect at a point that represents:
   A. The mean of the data
   B. The median of the data
   C. The mode of the data
   D. The range of the data

14. If each observation in a data set is increased by 5, what happens to the mean?
   A. It remains the same
   B. It increases by 5
   C. It decreases by 5
   D. It is multiplied by 5

15. The bar graph is best used to compare:
   A. Trends over time
   B. Parts of a whole
   C. Different categories
   D. Frequency distributions

16. What is the sum of the deviations of the numbers 2, 5, 6, 7, 10 from their mean?
   A. 0
   B. 5
   C. 10
   D. 15

17. If the arithmetic mean of the data is 20 and the standard deviation is 0, then the data:
   A. Is not normally distributed
   B. Has no variance
   C. Has a variance greater than 0
   D. Cannot be determined

18.

The histogram is a type of graph that is used to represent data that is:
A. Quantitative and continuous
B. Quantitative and discrete
C. Qualitative
D. Piecemeal

19. If the class mark (mid-point) of a certain class interval is 25 and the class size is 10, what is the lower limit of that class interval?
A. 20
B. 15
C. 30
D. 25

20. In a grouped frequency distribution, the mid-value of a class is 20 and the class width is 10. What is the upper limit of the class?
A. 25
B. 30
C. 35
D. 15

Statistics Quiz Answer Key

1. A
2. A
3. B
4. A
5. B
6. A
7. B
8. A
9. B
10. B
11. B
12. B
13. B
14. B
15. C
16. A
17. B
18. A
19. A
20. B

Next, we will prepare the quiz for "Probability." Let me know if you're ready to proceed!