

Data analyst

 Test duration: 45 minutes

 Difficulty level: **Moderate**



1. Which of the following Excel functions is most commonly used to calculate the average of a range of cells?

- A) SUM
- B) COUNT
- C) AVERAGE
- D) MEDIAN

Correct answer: C) AVERAGE

2. In SQL, which clause is used to filter the results based on a specified condition?

- A) SELECT
- B) WHERE
- C) GROUP BY
- D) ORDER BY

Correct answer: B) WHERE

3. Which of the following data visualization techniques is best suited to show the distribution of a single continuous variable?

- A) Bar chart
- B) Line chart
- C) Histogram
- D) Pie chart

Correct answer: C) Histogram

4. If you want to identify the correlation between two variables in a dataset, which statistical method would you use?

- A) T-test
- B) ANOVA
- C) Correlation coefficient
- D) Chi-square test

Correct answer: C) Correlation coefficient

5. Which of the following SQL functions is used to retrieve the current date and time?

- A) GETDATE()
- B) CURDATE()
- C) NOW()
- D) CURRENT_TIMESTAMP()

Correct answer: D) CURRENT_TIMESTAMP()

6. When visualizing categorical data, which of the following charts is most appropriate?

- A) Scatter plot
- B) Bar chart
- C) Line chart
- D) Heat map

Correct answer: B) Bar chart

7. In a dataset, if you need to remove outliers before performing analysis, which of the following methods would you most likely use?

- A) Normalization
- B) Filtering based on Z-scores
- C) Data imputation
- D) Aggregation

Correct answer: B) Filtering based on Z-scores

8. What does the R-squared value indicate in a linear regression model?

- A) The correlation between the independent and dependent variables
- B) The slope of the regression line
- C) The proportion of variance in the dependent variable explained by the independent variable(s)
- D) The standard error of the regression

Correct answer: C) The proportion of variance in the dependent variable explained by the independent variable(s)

9. Which of the following is a key benefit of using pivot tables in Excel?

- A) It automates data entry
- B) It helps summarize and analyze large datasets by organizing data into a meaningful structure
- C) It provides real-time data updates from external sources
- D) It enhances the visual appeal of the spreadsheet

Correct answer: B) It helps summarize and analyze large datasets by organizing data into a meaningful structure

10. You are presented with a dataset showing sales figures for different regions over the last five years. What is the most effective way to identify trends over time?

- A) Create a histogram of the sales figures
- B) Use a pie chart to represent the sales data
- C) Generate a line chart to show the change in sales over time
- D) Calculate the average sales for each region

Correct answer: C) Generate a line chart to show the change in sales over time