

Reg. No.:



Y7886

Name:

University of Kerala

Fourth Semester FYUGP Degree Examination, May 2026

Value Addition Courses

STATISTICS

UK4VACSTA203 - DATA ANALYSIS USING SPREADSHEETS

Academic Level: 200-299

2024 Admission

Time: 1 Hour

Max. Marks: 28

Part A. 4 Marks ,Time 5 Minutes (Cognitive Level :Remember(RE)/Understand(UN))Objective Type 1 mark each,
Answer all questions

Qn No.	Question	CL	CO
1	Name any one cloud-based spreadsheet application.	RE	1
2	For what type of data are bar diagrams used for comparison?	RE	3
3	Quartiles divide data into _____ equal parts.	UN	2
4	If the value of correlation coefficient, $r = -1$, it indicates _____.	UN	2

Part B. 8 Marks ,Time 15 Minutes (Cognitive Level :Understand(UN)/Apply(AP))Short Answer 2 marks each, Answer all questions

Qn No.	Question	CL	CO
5	Explain why diagrams are considered more effective than tables for representing data.	UN	3
6	What is the use of the Formula bar?	UN	1
7	Two datasets have same mean but different variances.Which is more consistent? Why?	AP	2
8	Which diagram is suitable for representing the profit and loss statement of a company over the last five years? Also, name the type of chart used to create it in a spreadsheet.	AP	3

Part C. 16 Marks ,Time 40 Minutes (Cognitive Level :Apply(AP)/Analyse(AN)/Evaluate(EV)/)Long Answer 4 marks each, Answer all questions choosing among options* within each question

Qn No.	Question	CL	CO
9	A) A business analyst creates this chart in a spreadsheet.	AP	3, 3

Qn No.	Question	CL	CO
	Monthly Sales Performance (Jan–Jun) Apply your understanding to answer: a) Which month has the highest sale. b) Find the average sales. c) Is there any trend in sales over the months? Justify your answer. OR B) A teacher creates this histogram in a spreadsheet. Apply your understanding to answer: a) How would you use this histogram to identify the performance level of the class? b) If more students score between 40–50, explain how the histogram changes. c) Why is a histogram preferred over a bar chart for this dataset? d) Suggest one action a teacher can take based on this visualization.		
10 A)		AN	2, 2

Qn No.	Question	CL	CO
	Find mean deviation about mean for the following data 15,32,37,39,45 OR B) A spreadsheet contains the daily sales of a shop for one week in cells B2:B8. The functions SUM, AVERAGE, MAX, and MIN have been applied to summarize the data. a) Examine the purpose of the SUM function in this dataset. b) Explain what information is provided by the AVERAGE function. c) Analyze the significance of the MAX function in understanding sales performance. d) Explain how the MIN and MAX functions help in identifying sales variation.		
11	A) Monthly savings data are entered in cells E2:E8. Explain how you will evaluate first quartile, median, 4th decile and 90th percentile. OR B) Daily sales data of a shop are entered in cells B2:B8 in a spreadsheet. a) Which function can be used for calculating total sales. b) Which function helps in analyzing variation in sales. c) Name the functions used for identifying highest and lowest sales.	EV	2, 2
12	A) Explain the situations in which a component bar diagram and a multiple bar diagram are used, along with suitable examples of your own. OR B) A health researcher studies the relationship between daily exercise time and calorie burn. a) Construct a spreadsheet structure for recording the two variables. b) Propose how to compute correlation between them using spreadsheet functions. c) Suggest how a scatter plot can be used to visualize the relationship. d) Explain how the researcher can interpret the trend from the graph.	CR	3, 2