

# School of Computing Science and Engineering

B.Tech CSE  
ETE - Jun 2023

Time : 3 Hours

Marks : 100

## Sem IV - E1UB401B - Data Analysis and Handling

*Your answer should be specific to the question asked*

*Draw neat labeled diagrams wherever necessary*

1. In Tableau, what does data visualisation mean? K3 CO3 (5)
2. Describe the functions of data handling K1 CO1 (5)
3. What factors determine an ANOVA's statistical significance? K2 CO2 (5)
4. Give an example to illustrate the Chi-square calculation procedures. K1 CO1 (10)
5. What is an ANOVA? Describe its purposes and usages K2 CO2 (10)
6. How to perform linear regression analysis in Excel using Analysis Tool Pack should be written down. K4 CO4 (10)
7. What are filters? How many types of filters are there in Tableau? K4 CO4 (10)

**OR**

- What are the differences between Tableau and other traditional BI tools? K4 CO4 (10)
8. All of the customer IDs may be located. Add the dollar sign and two decimal places to Columns E and D in currency. Find each city's total annual spending. Find the average annual spending for each education. The total number of clients by gender should be known. Find out how much money each gender makes overall each year in each city. Detail each stage in your writing. K4 CO4 (15)

**OR**

- Determine the Social Security Tax (S.S. Tax), which is 6% of Gross Pay; insert a formula in field F4 to multiply Gross Pay by 6%. Create a formula in cell G4 to deduct the Social Security tax from the gross pay before calculating the net pay. K4 CO4 (15)
9. The following two sets of data should each have a linear regression equation. The following data should be used to determine the regression coefficient and lines of regression. K3 CO3 (15)

M	0	1	2	3	4
N	2	3	5	4	6

10. Take deviations from the actual means of X and Y to calculate the two regression equations of X on Y and Y on X using the data provided below. Determine the expected demand for a price of Rs. 20. K3 CO3 (15)

Price(Rs)	10	12	13	12	16	15
Amount demanded	40	38	43	45	37	43