



SCHOOL OF ADVANCED SCIENCES  
DEPARTMENT OF MATHEMATICS  
WINTER SEMESTER - 2024-25  
PMDS503P\_Statistical Inference Lab  
**Programming with R**

LAB ASSIGNMENT

Date: 13.02.2025

1. The last date for the submission of the e-record for the assignment is **16th February 2025**.
2. Mention the Register Number, Name, Slot details, Course Code and Course Title on the document's first page.

**Assignment No. 1**

1. Draw the Histogram and Frequency polygon for the following data:

C.I.	Frequency
500-600	3
600-700	5
700-800	14
800-900	25
900-1000	68
1000-1100	41
1100-1200	43
1200-1300	8
1300-1400	6
1400-1500	2

2. Import a Multivariable dataset from the *datasets/MASS* package and plot the following:
  - (i) Display the number of variables in the dataset
  - (ii) Draw a box plot for any two variables.
  - (iii) Scatterplot for any two variables
  - (iv) Multiple bar diagram(with different color)
  - (v) Write your observations.

Note: Add the labels for X-Axis, Y-Axis and Title of the diagram.

3. From the data set given below, obtain the descriptive statistics for each variable and write your observations on the performance of students.

Sl. No.	DA	Quiz-1	Quiz-2	CAT-1	CAT-2	FAT
1	10	14	15	25	16	16
2	10	14	15	11	26	16
3	10	14	14	11	19	16
4	10	12	8	16	20	16
5	10	14	12	25	25	16
6	10	15	15	11	7	16
7	10	12	10	16	22	16
8	10	10	10	20	25	16
9	10	10	10	16	25	16
10	10	14	10	21	17	16
11	10	14	10	36	25	16
12	10	15	0	25	20	16
13	10	14	10	22	7	16
14	10	14	10	32	12	16
15	10	12	10	18	15	16
16	10	10	10	20	21	16
17	10	12	8	15	20	16
18	10	10	8	25	14	16
19	10	12	12	17	14	16
20	10	12	12	17	20	16
21	10	14	10	25	20	16
22	10	12	10	21	25	16
23	10	12	8	32	25	16
24	10	14	10	26	17	16
25	10	12	12	18	26	16
26	10	14	10	25	18	16
27	10	12	6	30	27	16
28	10	12	10	20	25	16
29	10	14	8	25	21	16
30	10	12	10	33	20	16
31	10	14	14	15	10	16
32	10	12	8	25	17	16
33	10	14	12	30	22	16
34	10	14	10	10	25	16
35	10	14	8	25	18	16
36	10	12	10	26	21	16
37	10	14	10	38	17	16
38	10	16	14	35	17	16
39	10	14	12	20	25	16
40	10	16	14	25	25	16
41	10	16	12	34	25	16
42	10	14	12	21	17	16
43	10	14	10	28	22	16

44	10	18	16	25	25	16
45	10	14	10	25	25	16
46	10	14	12	32	18	16
47	10	16	10	39	25	16
48	10	12	10	28	27	16
49	10	14	14	32	21	16
50	10	14	14	35	36	16
51	10	14	10	35	25	16
52	10	12	12	27	44	16
53	10	16	10	37	28	16
54	10	14	10	38	25	16
55	10	18	10	34	31	16
56	10	16	12	34	34	16
57	10	16	14	37	28	16
58	10	14	12	43	36	16
59	10	12	12	36	43	16
60	10	16	14	46	45	16
61	10	16	14	37	41	16
62	10	16	10	46	44	16
63	10	14	14	37	41	16
64	10	16	16	41	42	16
65	10	18	14	45	37	16
66	10	18	12	50	48	16
67	10	20	14	39	40	16
68	10	20	18	42	47	16
69	10	20	18	48	47	16