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B.B.A. (Part - II) (Semester - III) Examination, May- 2016 STATISTICAL TECHNIQUES FOR BUSINESS (Paper - I)

Sub. Code: 43940

Day and Date: Saturday, 07 - 05 - 2016

Total Marks: 40

Time: 03.00 p.m. to 05.00 p.m.

Instructions:

- 1) All questions are compulsory.
- 2) Figures to the right indicate full marks.
- 3) Use of non programmable calculator is allowed.
- 4) Graph paper will be supplied on request.

Q1) Attempt any Two:

[14]

- a) Define statistics. Explain scope of statistics.
- b) State the regression coefficients. You are given $\overline{X} = 40$, $\overline{Y} = 50$ S.D. for X = 2.5, S.D. for Y = 3.5 and correlation coefficient = 0.8. Obtain equation of regression line of X on Y and find best estimate of X when Y = 45.
- c) Find Mean Deviation (M.D.) about mean and M.D. about median from the data given below and show that M.D. about median is less than M.D. about mean.

31, 35, 29, 63, 55, 72, 37

Q2) Attempt any TWO:

[16]

Following data gives number of catches taken by A and B in 5 one day matches.

Catches taken by A	4	. 5	4	3	5
Catches taken by B	1	0	4	2	1

Find, who is consistent in the matter of taking the catches?

b) What is an Ogive curve?

Draw a less than Ogive curve from the following data and hence determine value of median.

Marks	0-10	10-20	20-30	30-40	40-50	50-60
No. of Students	3	9	15	30	18	5

c) Define the terms: Correlation and coefficient of correlation. Obtain correlation coefficient between X and Y from the following data:

X	3	5	4	6	2
Y	3	4	5	2	6

Comment on your result.

d) Explain measure of central tendency. Find mean and mode for the following data:

Wages in Rs.	30-40	40-50	50-60	60-70	70-80
No. of workers	9	13	25	11	7

Q3) Attempt any Two:

[10]

- a) Interpret, if
 - i) r = +1.
 - ii) r = -1.
 - iii) r = 0.
- b) The average income of the factory workers was Rs. 270. The mean income of 70 male workers was Rs. 300. Find the mean income of 30 female workers.
- c) For a set of 100 observations the sum is 389 and sum of squares is 2570. Find S.D. and C.V.

