Roll No.

Total No. of Pages : 02

Total No. of Questions : 08

BBA (Rural Development / SIM) (Sem.-2) BUSINESS STATISTICS Subject Code : BBA-201-18 M.Code : 75916 Date of Examination : 19-07-21

Time: 2 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. Attempt any FIVE question(s), each question carries 12 marks.

- 1. Define statistics and its limitations. Discuss the scope of statistics in business.
- 2. Why there is need of sampling? Explain any three probability sampling techniques with their merits and demerits.
- 3. Calculate mean, median and mode from the following data :

| Marks | 30-40 | 40-50 | 50-60 | 60-70 | 70-80 | 80-90 | 90-100 |
|-----------------|-------|-------|-------|-------|-------|-------|--------|
| No. of students | 3 | 4 | 6 | 10 | 6 | 4 | 3 |

4. Why there is need to calculate standard deviation and coefficient of variation? Compute the standard deviation and coefficient of variation from the following data :

| Size of item | 12 | 11 | 10 | 9 | 8 | 7 | 6 |
|--------------|----|----|----|----|---|---|---|
| Frequency | 4 | 5 | 8 | 13 | 9 | 6 | 3 |

5. Find Karl Pearson coefficient of correlation for the following data :

| Х | 10 | 12 | 18 | 16 | 15 | 19 | 18 | 17 |
|---|----|----|----|----|----|----|----|----|
| Y | 30 | 35 | 45 | 44 | 42 | 48 | 47 | 46 |

- 6. Differentiate between correlation and regression. Also explain the properties of regression coefficients.
- 7. a) What do you understand by the term probability? Discuss its importance in business decision making.
 - b) Three cars A, B and C are in a race. A is twice as likely to win as B and B is twice as likely to win as C. What are the respective probabilities of winning?

8. Write a note on Binomial Distribution. What are the conditions necessary for binomial distribution? Explain the steps required for fitting of a Binomial Distribution.

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