Roll No.

57516

BBA 2nd Semester (N. S.) 2014-17 Examination – July, 2022

BUSINESS STATISTICS

Paper: BBAN-206

Time: Three Hours]

[Maximum Marks: 80

Before answering the questions candidates should ensure that they have been supplied the correct and complete question paper. No complaint in this regard, will be entertained after examination.

Note: Attempt compulsory Question No. 1 from Section-A and four questions from Section-B (one question from each Unit). All questions carry equal marks.

SECTION - A

- 1. Write brief notes on:
 - (a) Histogram
 - (b) Advantages of diagrams
 - (c) Co-efficient of range

57516-5000-(P-4)(Q-9)(22)

P. T. O.

- (d) Harmonic mean
- (e) Equation of Y on X
- (f) Co-efficient of determination
- (g) Unweighted price index numbers
- (h) Time reversal test

SECTION - B

UNIT - I

- 2. Discuss the scope, limitations and applications of statistics.
- 3. Differentiate between classification and tabulation.

 Discuss the objectives and types of classification.

UNIT - II

4. Explain the meaning and objectives of an average. Discuss the calculation, merits and demerits of arithmetic mean, median and mode.

57516-5000-(P-4)(Q-9)(22) (2)

5. Find the values of quartile deviation, mean average deviation (from median) and standard deviation from the following data showing the money spent every date by 15 students:

56, 48, 43, 65, 78, 72, 46, 38, 82, 39, 57, 63, 75, 62, 49

UNIT - III

- 6. Discuss the meaning, types and significance of correlation. What are the differences between Karl Pearson's correlation co-efficient and spearman's correlation co-efficient?
- 7. From 10 observations of price (X) and supply (Y) of a commodity, the following figures were obtained:

$$\sum X = 130, \sum Y = 220, \sum X^2 = 2288, \sum Y^2 = 5506$$
 and $\sum XY = 3467$.

Obtain the two regression equations from the above figures.

P. T. O.

UNIT - IV

8. Obtain the Laspeyre's, Fisher's and Marshall-Edgeworth price index number from the following data:

Commodity	p ₀	q	<u>p</u> 1	q_1
A	8	25	65	30
В	20	70	30	55
С	5	16	20	45
D	10	36	15	20
E	27	80	10	60

Also show that Fisher's index satisfies factor reversal test.

9 Explain the use of time series in business forecasting and its limitations. Describe the components of a time series.