

B.C.C.A.(with Credits)-Regular-Semester 2012 Sem III
BCCA231 - Statistical Techniques and Business Mathematics-I

P. Pages : 2

Time : Three Hours



GUG/W/16/2948

Max. Marks : 80

- Notes : 1. All questions are compulsory.
2. All questions carry equal marks.

1. a) Explain importance of statistics. 8
- b) Calculate Harmonic Mean. 8

Size	6-10	10-14	14-18	18-22	22-26	26-30
Frequency	5	7	12	15	9	2

OR

- c) Calculate mean, median & mode. 16

Monthly Income	300-325	325-350	350-375	375-400	400-425	425-450	450-475	475-500
No. of Person	5	17	80	227	326	248	88	9

2. a) Find out mean Deviation from mean and its coefficient. 8

Height in inches	58	59	60	61	62	63	64	65	66
No. of Students	15	20	32	35	33	22	20	10	8

- b) Calculate Range and it's coefficient. 8

Marks	5-9	10-14	15-19	20-24
No. of Students	3	6	4	1

OR

- c) Calculate Quartile skewness. 16

Class	0-5	5-10	10-15	15-20	20-25	25-30	30-35
Frequency	4	10	12	4	6	16	8

3. a) Find out coefficient of correlation between height of father & height of son from the following data. 8

Height of father in cms.	165	166	167	167	168	169	170	172
Height of son in cms.	167	168	165	168	172	172	169	171

- b) Calculate the coefficient of correlation by the method of concurrent deviation. 8

Year	1925	1926	1927	1928	1929	1930	1931	1932	1933	1934
Average No. of daily Labourers	368	384	385	361	347	384	395	403	400	385
Average No. of bates consumed	22	21	24	20	22	26	26	29	28	27

OR

- c) Calculate coefficient of correlation between marks in Accountancy and marks in statistics obtained by 70 students of a class Also calculate it's P.E. 16

Marks in Statistics	Marks in Accountancy				
	25	35	45	55	65
25	-	-	-	1	1
35	-	-	3	8	7
45	-	2	6	13	9
55	1	5	3	4	-
65	2	3	2	-	-

4. a) Soni purchased one Bike for Rs. 25,000. She sold that Bike to her friend Bhaskar at 10% profit. The Bike did not work well at the Bhaskar's house. He sold it back to Soni for Rs. 24,750. Calculate loss % the suffered. 8
- b) The price of plot has increased by 60% if the present price of a plot is Rs. 64,000. Find the old price of a plot. 8

OR

- c) Miss Rani purchased a T.V. set for Rs. 14,500 and sold it Mr. Sagar at profit of 20%. Mr. Sagar then sold it to Mr. Kishor at a profit of 5%. How much percent more did Mr. Kishore pay than Miss Rani for the set. 8
- d) In a examination 45% students failed in Hindi and 55% failed in English. If 15% students failed in Both the subjects. Find the % of those students passed in both the subjects. 8

5. Write short note.

- a) Scope of statistics. 4
- b) Features of Dispersion. 4
- c) Rank correlation. 4
- d) Define percentage. 4
