

Master of Commerce Examination: May 2016
Semester: IV Center for Distance Education

Day & Date	Semester	Subject Name	Time	Code
Friday 27/05/2016	IV	Advanced Research Methodology and Statistical	11.00 A.M. To 02.00 P.M.	420003

Instructions: 1) All questions carry equal marks.

2) Attempt any Five questions from Remaining.

3) Students are allowed to use statistical table and calculator during examination.

Q.1 Explain the difficulties in formulating research hypothesis and discuss its sources. **20**

Q.2 Discuss the importance and features of research design. **20**

Q.3 What is sampling? Discuss its merits and demerits. **20**

Q.4 Find the median and quartile deviation for the following data: **20**

Marks	No. of students
0 – 10	12
10 – 20	18
20 – 30	15
30 – 40	25
40 – 50	10
50 – 60	8
60 – 70	7
70 – 80	5

Q.5 A) Workers in four different factories A, B, C and D are sampled to know their weekly income. Test the hypothesis using chi-square test that there is no significant difference in the income of worker in these factories at 5% level of significance. **15**

Weekly Income	Factories			
	A	B	C	D
Under Rs. 500	10	15	15	10
Rs. 500 to Rs. 1000	5	10	15	10
Above Rs. 1000	15	15	8	22

B) State the meaning of level of significance in hypothesis testing. **05**

Q.6 Find standard deviation and mean for the following:

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Daily Wages (Rs.)	No. of Workers
100 – 110	15
110 – 120	18
120 – 130	20
130 – 140	10
140 – 150	12
150 – 160	8

Q.7 Write a short notes: (Any Two)

20

- a) non-random sampling methods
- b) Students t-test
- c) Merit and demerits of median