

16P142

(Pages:2)

Name:

Reg. No.....

FIRST SEMESTER M.Com. DEGREE EXAMINATION, NOVEMBER 2016

(Regular/Supplementary/Improvement)

(CUCSS-PG)

CC15P MC1 C02 – QUANTITATIVE TECHNIQUES FOR BUSINESS DECISIONS

(Commerce)

(2015 Admission Onwards)

Time: Three Hours

Maximum: 36 Weightage

PART-A

Answer *all* questions. Each question carries **1** weightage

1. What do you mean by variance ratio test?
2. Distinguish between parameter and statistic.
3. What is 't' distribution?
4. What is SQC?
5. What is Yates correction?
6. What is the level of significance? **(6x 1=6 weightage)**

PART-B

Answer *any six* questions. Each question carries **3** weightage

7. The following is the arrangement of 25 men- M and 15 women- W lined up to purchase tickets for a premier picture show:
MWMMMWMMWMWMMWWMMMWMWMMWMMMMMMWWMMMMM
M
8. A sample of 400 male students is found to have a mean height of 171.38 cm. can it be reasonably regarded as a sample from a large population with mean height 171.17cm and standard deviation 3.30cm
9. A random sample of size 100 has mean 45 and S.D 15. Find the range within which the populations mean may lie.
10. Chi square test is a test of homogeneity, goodness of fit and test of independence. Explain?
11. Write notes on Kruskal Wallis test , Wilcoxon signed rank test and Mann-Whitney U test.
12. A random sample of size 25 from a population gives the sample standard deviation to be 8.5. Test the hypothesis that the population standard deviation is 10.
13. In 120 throws of six faced die, the even numbers occur 55 times. Is the die unbiased?

14. A die is tossed 120 times and the following result were obtained

No. of turned up:	1	2	3	4	5	6
Frequency	30	25	18	10	22	15

Test the hypothesis that the die is unbiased

(6 x 3=18 weightage)

PART-C

Answer *any two* questions. Each question carries 6 weightage

15. A test was given to 5 students chosen at random from the M.com , class of each of the three universities in Bihar. Their scores were found as follows

University		Scores				
		1	2	3	4	5
A	---	90	70	60	50	80
B	---	70	40	50	40	50
C	---	60	50	60	70	60

Is there a significant difference between scores of students in the three universities?

16. One thousand articles from a factory were examined and found to be 3% defective. Among 1500 similar articles from a second factory are found to be only 2% defective. Can it reasonably be concluded that the product of the first factory is inferior to the second?

17. The following figures give the number of defectives in 20 samples, each sample containing 2000 items.

425 430 216 341 225 322 280 306 337 305 356 402
216 264 126 409 193 326 280 389

calculate the values for central line and the control limits for p - chart. Draw the p - chart and comment if the process can be regarded as under control or not?

(2x 6=12 weightage)
