## 22PECCT1002

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## 22PECCT1002 - Statistical Methods for Economics

Total Duration : 2 Hrs. 30 Mins.

Total Marks : 60

## Section B

Answer any **SIX** questions  $(6 \times 5 = 30 \text{ Marks})$ 

- 1. Explain the concepts of sampling Distribution and Standard error.
- 2. Explain, with illustration, the concept of
  - (i) Point Estimation.
  - (ii)Interval Estimation.
- 3. Define Probability and explain the importance of this concept in statistics.
- 4. What is a null hypothesis? State the null hypothesis which leads to development of t-test.
- 5. Difference between correlation and regression.
- 6. What is Chi square test of goodness of fit? What cautions are necessary while applying this test?
- 7. What is normal distribution? Highlight its important properties.
- 8. Explain the meaning of regression coefficient and the regression lines

## Section C

I - Answer any **TWO** questions  $(2 \times 10 = 20 \text{ Marks})$ 

- 9. Discuss the role of standard error in the large sample test.
- 10. Describe the important properties of a good estimation.
- 11. Distinguish between:
  - (a) Linear and non-linear correlation
  - (b) Simple, Partial and Multiple correlation.
- 12. The mean of a binomial distribution is 20 and standard deviation is 4. Find out n, p and q.

II - Compulsory question  $(1 \times 10 = 10 \text{ Marks})$ 

13. Use the Chi- square test from following data.

No.turned up	1	2	3	4	5	6	Total
frequency	30	25	18	10	22	15	120

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