ADCA-8,BCA-9

2nd Year Examination, Academic Batch 2016-17

Computer Oriented Statistical & Optimization Methods

Time : 3 Hours]   *[Max. Marks : 100*

Note*. Attempt any **five** questions. All questions carry equal marks.*

Q.1. A Company is planning to improve plant safety. For this, accident data for the last 50 weeks was compiled. these data are grouped into the frequency distribution as shown below. Calculate the Arithmetic Mean of the number of accidents per week.

No. Of accidents :	0-4	5-9	10-14	15-19	20-24
No. Of weeks :	5	22	13	8	2

Q.2. Describe Measures of Central Tendency & write the characteristics of Arithmetic Mean of a distribution.

Q.3. (a) If the probability of committing an error follows normal distribution ,compute the probable error from the following data:
4.8, 4.2, 5.1, 3.8, 4.4, 4.7, 4.1 and 4.5.
(b) Explain the term binomial distribution.

Q.4. Define Sampling and Discuss the advantages of Sampling Techniques.

Q.5. Find the Median of the following distribution -

x :	2	3	4	5	6
f :	1	3	7	3	1

Q.6. Define Probability Distributions and discuss any two Probability Distributions.

Q.7. Solve the following assignment problem

	1	2	3	4
I	2	3	4	5
II	4	5	6	7
III	7	8	9	8
IV	3	5	8	4

Q.8. Describe Graphical Method to solve a Linear Programming Problem.