CP-102: STATISTICAL METHODS

Objectives

The objective of the course is to make the students familiar with some basic statistical and linear programming techniques. The main focus, however, is in their applications in business decision making.

Course Contents

Unit -I
Introduction: Application of Statistics in Business & Management; Basic Concepts of Statistical Studies: Population, Variable and Parameter, Sample; Classification of Data;. Diagrammatic & Graphical Presentation of Data: Bar Diagram, Histogram, Pie – Diagram, Frequency Polygons, and Ogives.

Unit-II
Summary Statistics: Measures of Central Tendency: Arithmetic Mean, Weighted Mean, Median and Mode .Index Numbers: Concept &Applications.

Unit-III
Measures of Dispersion: Range, Average Deviation. Standard Deviation, Variance and Coefficient of Variation.

Unit-IV
Forecasting Techniques: Simple Correlation & Regression Analysis, Time Series Analysis- Trend Analysis, Cyclical Analysis, Seasonal Analysis, Irregular Variation

Unit-V
Probability : Introduction of Probability Theories, Concepts, Addition & Multiplication Theorems, Probability Distributions: Binomial Poission, Normal and Exponential

Suggested Readings

1.   Chadha, N. K. *Statistics for Behavioral and Social Scientists,* Reliance Publishing House, Delhi,1996

2.   Gupta, S P and Gupta M P. *Business Statistics.* New Delhi, Sultan Chand, 1997.

3.   Kazmier, L J and Pohl, N F. *Basic Statistics for Business and Economics.* New York, McGraw Hill, 1988.

4.   Levin Richard I and Rubin David S. *Statistics for Management.* New Jersey, Prentice Hall Inc., 1995.

5.   Terry, Sineich. *Business Statistics by Examples.*London, Collier Mac Millian Publishers, 1990.

6.   Quantitative Techniques - N.D.Vohra